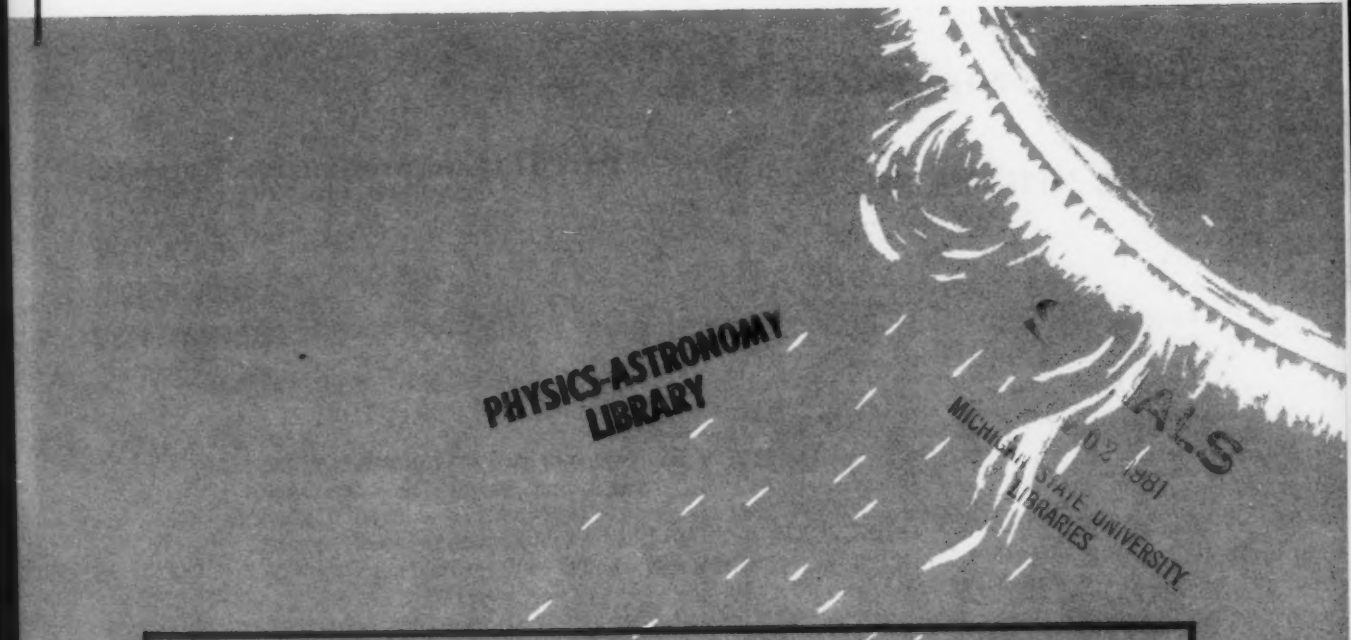
SEPTEMBER 1981 NUMBER 445 -- Part II

Solar-Geophysical Data comprehensive reports

Data for March 1981, January 1980, & Miscellanea

Explanation of Data Reports Issued as Number 438 (Supplement) February 1981



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NO. 445 SEPTEMBER 1981

Part II (Comprehensive Reports)

DATA FOR
MARCH 1981
JANUARY 1980

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SOLAR-GEOPHYSICAL DATA

No. 445

Issued in two parts

Helen E. Coffey, Editor

Joe H. Allen, Chief
Solar-Terrestrial Physics Division

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"434A 46" listed under 1980 Aug means that the sunspot drawings for Aug 1980 were contained in *Solar-Geophysical Data* Number 434 - Part I, beginning on page 46.

A = Part I, B = Part II.

----- = no data available.
blank = data not yet received.

SGD 445 Part II (Comprehensive)

MARCH 1981 DATA

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NOTE ON DELAY OF GROUPED SOLAR FLARE DATA

Beginning with the July 1980 issue of Solar-Geophysical Data, we planned to publish the final listing of solar flares 13 months, rather than 6 months, from the date of observation. Although this schedule has not been met since the July 1980 issue was published, we and our colleagues at the Meudon Observatory plan to return to the 13-month delay as soon as possible. This new schedule will cause the Daily Flare Index and the Regional Flare Index to appear 13 and 14 months from the date of observation. At the same time we are suspending indefinitely publication of the Abbreviated Calendar Record. We deeply regret this situation, but the volume of data recorded during sunspot maximum and computer conversion problems at the Meudon Observatory and at NGSDC have forced these greater delays on us.

For researchers who need the comprehensive solar flare data more promptly, NGSDC plans to generate in the next few weeks "preliminary" listings from February 1980 through the "current" month that lies 13 months from the month of observation. These complete tabulations will lack the final Meudon corrections, and will only be published after they have been made. Nevertheless, printouts for this period will be available on request, if they be recognized as "preliminary" when used in research projects. A fee may be charged for reproducing these data. Please contact the editor, Helen E. Coffey, at (303) 497-6223 or telex 45897 SOLTERWARN BDR.

SOLAR RADIO EMISSION
OUTSTANDING OCCURRENCES

MARCH 1981

DAY OF MONTH	FREQUENCY	STATION	TYPE	STARTING TIME	TIME OF MAXIMUM	DURATION	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1}		INT	POLARIZATION OR REMARKS
				UT	UT	MINUTES	PEAK	MEAN		
01	200	GORK	44 NS	0358.0E		415.0D		10		
	100	GORK	44 NS	0500.0E		411.0E		10		
	127	TORN	44 NS	0700.0E	1411.8	500.0D	140	15		V1
	260	ONDR	44 NS	0754.0E		442.0D	18			
	200	HIRA	44 NS	2108.0E	2309	680.0D	30	10		WR
	245	LEAR	43 NS	2331.0	0911.6	664.0D	119			
	3750	TYKW	45 C	0058.0	0100.4	10.0	11	4		
	9400	TYKW	21 GRF	0059.0	0100.7U	35.0	6 U	2 U		INTERFERENCE
	4995	LEAR	8 S	0100.1	0100.3	1.0	22			
	8800	LEAR	8 S	0100.1	0100.3	1.2	11			
	3750	TYKW	30 PBI	0108.0		20.0	2	1		
	9400	TYKW	5 S	0114.0U	0115.0U	4.0U	8 U	3 U		
	3750	TYKW	5 S	0114.0	0115.2	3.0	2	.5		
	8800	LEAR	8 S	0114.8	0115.3	1.7	16			
	3750	TYKW	5 S	0159.0	0200.6	20.0	3	1		
	2000	TYKW	5 S	0200.0	0200.6	3.0	2	.5		
	1000	TYKW	5 S	0200.0	0200.5	1.0	3	.5		
	3750	TYKW	21 GRF	0335.0	0423	130.0	6	2		
	2000	TYKW	21 GRF	0335.0	0425	125.0	2	1		
	1000	TYKW	45 C	0343.5	0344.1	1.0	115	8		
	2000	TYKW	5 S	0343.7	0344.1	1.0	1	.3		
	3750	TYKW	5 S	0343.9	0344.1	.6	1.5	.5		
	3750	TYKW	45 C	0441.0	0442.5	8.0	7	3.5		
	4995	LEAR	4 SF	0441.5	0442.1	2.1	10			
	3750	TYKW	29 PBI	0449.0		45.0	2.5	1		
	410	LEAR	8 S	0623.3	0623.6	.8	41			
	3750	TYKW	21 GRF	0632.0	0638	50.0	4	2		
	2000	TYKW	20 GRF	0635.0	0642	45.0	2	1		
	3750	TYKW	5 S	0700.0	0701.5	4.0	3	1		
	930	BORD	41 F	0900.6	0900.8	.4	21	2		
	606	SGMR	8 S	1415.3	1415.8	.8	19			
	2800	OTTA	23 GRF	1430.0	1500	200.0	5.6			
	2800	OTTA	1 S	1728.0	1729	2.0	2.4	1.8		
	245	SGMR	8 S	1815.5	1815.6	.6	280			
	2800	OTTA	20 GRF	1910.0	1945	140.0	3.8	2.0		
	2695	PENT	21 GRF	2035.6	2227	205.0	4.4	1.8		
	2000	TYKW	20 GRF	2200.0U	2230	110.0U	8	4 U		
	2800	OTTA	1 S	2207.0	2211	8.0	5.8	2.6		
	3750	TYKW	21 GRF	2208.0	2230	100.0	5	2.5		
	9400	TYKW	20 GRF	2208.0	2237	100.0	11	5		
02	200	GORK	44 NS	0352.0E		488.0D		10		
	100	GORK	44 NS	0451.0E		489.0D		10		
	127	TORN	44 NS	0700.0E	0921.3	500.0D	23000	60		V2
	260	ONDR	44 NS	0755.0E		430.0D	13			
	200	HIRA	44 NS	2105.0E	2311	680.0D	20	7		WR
	3750	TYKW	5 S	0046.0	0047.3	4.0	6	2		
	9400	TYKW	5 S	0047.0	0047.2	1.0	3	1		
	3750	TYKW	5 S	0118.0	0125	20.0	2	1		
	2000	TYKW	5 S	0140.0	0148	15.0	2	1		
	3750	TYKW	5 S	0141.0	0143	10.0	1	.5		
	2000	TYKW	20 GRF	0200.0	0220	45.0	4	1.5		
	3750	TYKW	20 GRF	0204.0	0218	50.0	4	2		
	9400	TYKW	20 GRF	0210.0	0220	50.0	2	1		
	3750	TYKW	21 GRF	0310.0	0322	70.0	6	2		
	3750	TYKW	45 C	0445.0	0453.1	15.0	5.5	1.5		
	2000	TYKW	21 GRF	0445.0	0456	45.0	1.5	.7		
	1000	TYKW	8 S	0447.4	0447.5	.2	3	1		
	1000	TYKW	45 C	0450.8	0450.9	.5	6	2		
	2000	TYKW	5 S	0450.8	0450.9	.5	2.5	1		
	2000	TYKW	5 S	0452.8	0453.0	.5	3	1		
	3750	TYKW	30 PBI	0500.0		30.0	2	1		
	6100	KISV	1 S	0506.5	0507.6	2.0	10			
	9400	TYKW	5 S	0507.3	0507.7	1.0	6	2		
	3750	TYKW	5 S	0507.4	0507.8	7.0	6	2		
	2000	TYKW	5 S	0507.4	0507.8	1.5	4	1.5		
	3750	TYKW	5 S	0517.0	0518.5	10.0	2	1		
	3750	TYKW	5 S	0546.0	0603 U	25.0	8 D	2 D		
	9400	TYKW	5 S	0600.0	0603	10.0	3	1.5D		
	2000	TYKW	5 S	0601.0	0603	10.0	1	.5D		
	9100	GORK	21 GRF	0933.7		164.0E				
	9100	GORK	1 S	0939.4	0939.8	.7	7	3		
	2950	GORK	20 GRF	1013.3	1024.0	37.0E	5			
	930	BORD	8 S	1058.0	1058.1	.2	15	2		
	9400	HUAN	S	1212.0	1235.0	49.3	20.8	6.2		L
	9500	POTS	23 GRF	1223.0	1239.5	32.0	10			
	3000	POTS	23 GRF	1223.0	1231.7	32.0	7.4			
	4995	ATHN	4 SF	1224.1	1231.6	28.7D	11			
	8800	ATHN	4 SF	1224.1	1224.6	29.5	25			
	2695	ATHN	4 SF	1224.3	1231.8	23.0D	08			
	930	BORD	8 S	1227.9	1227.9	.1	16	1		
	2800	OTTA	23 GRF	1300.0	1550	415.0	19.2			
	2800	OTTA	4 S/F	1309.0	1316.2	13.0	45.0	15.6		
	3000	POTS	29 PBI	1309.0	1316	91.0	86			

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02	1470	POTS	29 PBI	1310.0	1316	110.0D	185			
	9500	POTS	23 GRF	1310.0	1316	35.0	20			
	2695	SGMR	4 SF	1310.0	1316.1	11.1D	71			
	2650	DWIN	45 C	1310.0	1316	17.0	80	30		
	5200	BERN	22 GRF	1310.1	1316.2	30.0	81.0			
	3200	BERN	22 GRF	1310.1	1316.0	30.0	.0			ONLY PAPER REC
	8400	BERN	22 GRF	1310.1	1316.4	27.0	36.0			
	930	BORD	40 F	1311.0	1316.5	18.0	29	7		
	808	ONDR	41 F	1311.0	1325.4	17.0	20	9		
	1415	SGMR	4 SF	1311.0	1315.1	9.0D	210			
	4995	SGMR	4 SF	1311.5	1316.1	8.1D	39			
	430	KRAK	42 SER	1311.5	1314.7	14.5	40			
	11800	BERN	22 GRF	1312.0	1326.3	27.0	16.0			
	810	KRAK	41 F	1312.0	1316.2	8.5	15	5		
	8800	SGMR	4 SF	1312.6	1316.0	6.7	24			
	606	SGMR	4 SF	1313.6	1316.1	5.5D	43			
	9400	HUAN	S	1314.4	1316.1	3.5	12.8	5.7		L
	810	KRAK	2 S/F	1325.0	1325.3	2.5	28	5		
	9400	HUAM	S	1325.1	1326.7	2.0	9.6	5.4		L
	2800	OTTA	4 S/F	1325.7	1326.3	2.0	26.0	12.0		
	1470	POTS	4 S/F	1325.7	1326.4	2.3	14			
	3000	POTS	4 S/F	1325.7	1326.8	2.3	34			
	3200	BERN	3 S	1432.2	1433.3	3.5	.0			ONLY PAPER REC
	8400	BERN	3 S	1432.2	1433.4	2.0	70.0			
	5200	BERN	3 S	1432.2	1433.3	3.5	23.0			ONLY PAPER REC
	11800	BERN	3 S	1432.5	1433.4	2.0	57.0			
	8800	ATHN	4 SF	1432.5	1433.3	4.8	63			
	4995	ATHN	4 SF	1432.6	1433.3	4.9D	19			
	9400	HUAN	S	1432.7	1433.3	2.0	62.4	22.4		L
	9500	POTS	3 S	1433.0	1433.5	1.5	50			
	2695	ATHN	4 SF	1433.1	1433.6	2.2D	04			
	19600	BERN	3 S	1433.2	1433.5	1.0	12.0			
	10715	DWIN	1 S	1438.0	1438.5	1.0	55	30		
	2695	SGMR	4 SF	1839.1	1844.0	20.9	06			
	2800	OTTA	20 GRF	1840.0	1850	50.0	8.6	4.3		
	2800	OTTA	240AR	2010.0	2100	50.0	7.6	3.8		
	2800	OTTA	1 S	2050.0	2050.7	2.0	2.4	1.2		
	2800	OTTA	21 GRF	2115.0	2123	65.0	7.0	3.5		
	2800	OTTA	1 S	2117.0	2118	4.3	5.6	2.8		
	2800	OTTA	1 S	2129.0	2130	2.0	2.4	1.2		
	9400	TYKW	5 S	2233.0	2235.1	4.0	52	20		
	3750	TYKW	5 S	2233.0	2235.1	4.0	52	18		
	2000	TYKW	5 S	2234.0	2235.1	3.0	78	8		
	2695	PENT	3 S	2234.0	2235	3.0	50.0	12.5		
	2695	PENT	29 PBI	2237.0	2237	40.0	7.6	3.8		
	3750	TYKW	30 PBI	2237.0		65.0	14	5		
	2000	TYKW	29 PBI	2237.0		40.0	2	1		
	9400	TYKW	29 PBI	2237.0		65.0	14	6		
	3750	TYKW	5 S	2239.0	2239.1	.5	28	6		
03	200	GORK	44 NS	0500.0E		480.0D		10		
	100	GORK	44 NS	0503.0E		477.0D		5		
	245	LEAR	43 NS	0614.6	0652.0	259.4D	130			
	127	TORN	44 NS	0700.0E	0847.3	500.0D	190	30		V8
	260	ONDR	44 NS	0810.0E		414.0D	22			
	200	HIRA	44 NS	2105.0E	0015	680.0D	15	10		WR
	9400	TYKW	20 GRF	0030.0	0130	110.0	5	2		
	3750	TYKW	20 GRF	0030.0	0130	110.0	6	3		
	2000	TYKW	20 GRF	0040.0	0120	110.0	5	2.5		
	2000	TYKW	20 GRF	0230.0	0300	50.0	1.5	.7		
	9400	TYKW	20 GRF	0230.0	0255	50.0	3	1.5		
	3750	TYKW	20 GRF	0230.0	0250	50.0	2	1		
	3750	TYKW	45 C	0334.5	0336.3	8.5	21	8		
	9400	TYKW	45 C	0334.5	0335.3	8.5	56	10		
	5730	IRKU	45 C	0334.5	0335.4	3.0	67			L
	5730	IRKU		0334.5	0336.4		31			L
	15400	LEAR	8 S	0334.8	0335.3	1.3	08			
	4995	LEAR	8 S	0334.6	0335.3	2.0	56			
	8800	LEAR	8 S	0334.8	0335.3	1.8	70			
	2000	TYKW	45 C	0336.0	0336.3	1.0	1	.3		
	5730	IRKU	29 PBI	0337.5		8.5	18			L
	9400	TYKW	29 PBI	0343.0		30.0	7	3		
	3750	TYKW	30 PBI	0343.0		35.0	5	2		
	3750	TYKW	5 S	0353.0	0356	12.0	4	1.5		
	3750	TYKW	5 S	0422.0	0426	15.0	2	1		
	1000	TYKW	5 S	0428.8	0429.0	.5	7	2.5		
	3750	TYKW	5 S	0439.0	0447.9	20.0	6	1.5		
	9400	TYKW	8 S	0442.4	0442.5	.2	15	5		
	2000	TYKW	45 C	0447.0	0448.1	4.0	7	1.5		
	1000	TYKW	45 C	0447.5	0447.8	3.5	4.5	1		
	9400	TYKW	5 S	0456.5	0456.8	1.5	5	1.5		
	3750	TYKW	28 PRE	0509.0	0509.6	6.3	3	1		
	9400	TYKW	28 PRE	0513.0	0514.1	2.0	8	3		
	9400	TYKW	5 S	0515.0	0515.6	4.8	70	15		
	8800	LEAR	8 S	0515.1	0515.6	1.7	73			

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03	15000	KISV	8 S	0515.2	0515.8	2.0	40			
	3750	TYKW	45 C	0515.3	0515.6	1.7	15	4		
	17000	NOBE	1 S	0515.5	0515.7	1.2	38			L
	15400	LEAR	8 S	0515.5	0515.6	.5	67			
	3750	TYKW	30 PBI	0517.0		40.0	3	1.5		
	9400	TYKW	30 PBI	0519.0		40.0	4	2		
	245	LEAR	8 S	0520.3	0520.5	.5	32			
	9400	TYKW	45 C	0528.0	0532	20.0	18	7		
	2000	TYKW	5 S	0529.0	0532.2	13.0	3	1		
	3750	TYKW	45 C	0529.0	0532.2	13.0	9	2.5		
	8800	LEAR	4 SF	0529.3	0531.8	7.2	29			
	2695	LEAR	8 S	0531.6	0532.8	.2	13			
	4995	LEAR	8 S	0531.6	0532.1	.2	13			
	1000	TYKW	28 PRE	0558.0	0650	52.0	25	8		
	245	LEAR	8 S	0559.3	0559.6	.5	13			
	2000	TYKW	28 PRE	0600.0	0637.0	50.0	43	7		
	650	GORK	23 GRF	0623.3		186.7	25			
	9400	TYKW	28 PRE	0625.0	0629.1	25.0	20	6		
	3750	TYKW	28 PRE	0625.0	0636.7	25.0	110	8		
	1415	MANI	47 GB	0625.0	0701.3	76.3D	350			
	606	MANI	47 GB	0625.5	0703.3	77.5D	93			
	2950	GORK	23 GRF	0625.8	0730.0	300.0E	100			
	950	GORK	21 GRF	0626.0	0648.1	97.0	15			
	2695	MANI	47 GB	0626.0	0702.3	73.0D	180			
	8800	ATHN	4 SF	0627.6	0629.1	3.2	32			
	4995	ATHN	4 SF	0627.6	0629.1	3.0D	32			
	4995	MANI	4 SF	0628.3	0704.1	71.7D	100			
	8800	MANI	4 SF	0628.3	0628.8	56.7	29			
	9100	GORK	1 S	0628.6	0629.0	2.3	22	10		
	8800	LEAR	8 S	0628.8	0629.1	.3	22			
	4995	LEAR	8 S	0628.8	0629.1	.3	19			
	200	GORK	27 RF	0633.0	0715.0	66.0	95			
	2695	ATHN	4 SF	0633.1	0636.6	5.9D	110			
	8800	ATHN	4 SF	0633.1	0638.1	12.2	26			
	4995	ATHN	4 SF	0633.6	0637.1	9.5D	20			
	9100	GORK	22 GRF	0634.1	0712.3	357.0	39			
	3100	CRIM	3 S	0635.5	0636.2	2.0	62	21		
	2950	GORK	3 S	0636.0	0636.6	1.4	100			
	200	HIRA	46 C	0643.0	0655.7	110.0D	90	40 U		MR, SUNSET
	204	IZMI	25 R	0645.0	0658.0	75.0	140	70		
	606	LEAR	47 GB	0647.8	0703.3	52.2	130			
	410	LEAR	47 GB	0647.8	0726.3	52.2	81			
	100	HIRA	46 C	0649.5	0721.4	100.0D	630	230 U		WR, SUNSET
	100	GORK	46 C	0649.5	0649.8	2.2	40 D			
	950	GORK	45 C	0649.5	0702.7	49.5	13.6			
	950	GORK		0649.5	0738.7		20			
	3100	CRIM	47 GB	0649.5	0701.5	35.0	200	67		
	2950	GORK	3 S	0649.5	0654.6	5.2	100			
	650	GORK		0649.8	0730.1		53			
	650	GORK	45 C	0649.8	0703.5	48.0	89			
	1415	LEAR	47 GB	0649.8	0702.3	50.2	250			
	5200	BERN	20 GRF	0650.0	0707.1	60.0	93.0			
	3200	BERN	20 GRF	0650.0	0702.5	60.0	.0			ONLY PAPER REC
	1000	TYKW	45 C	0650.0	0702.4	50.0	260	100		
	9400	TYKW	5 S	0650.0	0709.6	30.0	43	28 U		RAIN
	3750	TYKW	45 C	0650.0	0702.3	50.0	125 U	80 U		INTERFERENCE
	2000	TYKW	45 C	0650.0	0702.2	50.0	240	100		
	2695	ATHN	4 SF	0650.1	0702.0	55.0D	320			
	1415	ATHN	4 SF	0650.3	0702.0	57.7D	300			
	100	GORK		0650.9			0 .D			
	4995	ATHN	4 SF	0651.1	0707.0	46.0D	79			
	4995	LEAR	47 GB	0652.0	0708.1	48.0	85			
	8800	LEAR	47 GB	0652.1	0702.3	37.9	53			
	2695	LEAR	47 GB	0653.3	0702.3	46.7	210			
	8800	ATHN	4 SF	0654.8	0707.0	51.0	31			
	9500	POTS	20 GRF	0700.0E	0710	25.0D	15			
	1470	POTS	45 C	0700.0E	0702.5	80.0D	220			
	3000	POTS	45 C	0700.0E	0701.7	85.0D	131			
	100	GORK	27 RF	0706.0	0730.0	160.0	1460	300		
	9400	TYKW	29 PBI	0720.0		40.0D	27 U	22 D		
	3100	CRIM	29 PBI	0723.9	0724.0	92.0	44	12		
	3750	TYKW	29 PBI	0740.0		20.0D	30	27 D		
	1000	TYKW	29 PBI	0740.0		20.0D	20 U	14 D		
	2000	TYKW	29 PBI	0740.0		20.0D	28	23 D		
	3100	CRIM	26 FAL	0906.5	0945.0		15			
	930	BORD	41 F	1232.1	1232.2	.3	13	2		
	930	BORD	46 C	1236.4	1236.6	.5	61	3		
	2800	OTTA	23 GRF	1240.0	1335	235.0	30.0	18.8		
	9400	HUAN	S	1310.2	1340.1	49.6	11.3	5.8		0
	930	BORD	46 C	1514.3	1514.6	.7	42	5		
	2800	OTTA	20 GRF	1515.0	1520	17.0	5.2	2.4		
	2800	OTTA	21 GRF	1640.0	1700	70.0	4.6	2.3		
	2800	OTTA	4 S/F	1730.5	1731.2	1.5	21.6	7.0		
	2800	OTTA	29 PBI	1732.0	1732	8.0	3.4	1.7		
	2800	OTTA	22 GRF	1915.0	1952	145.0	5.6			

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03	9400	TYKW	21 GRF	2235.0	2325	120.0	6	3		
	2000	TYKW	20 GRF	2250.0	2325	95.0	4	2		
	3750	TYKW	20 GRF	2250.0	2325	95.0	7	4		
	2695	PENT	20 GRF	2250.0	2320	85.0	4.4	2.4		
04	100	GORK	44 NS	0523.0E		460.0D		5		
	200	GORK	44 NS	0526.0E		454.0D		5		
	127	TORN	44 NS	0700.0E	0939.3	336.0D	120	50		V0,DISTURBED
	260	ONDR	44 NS	0800.0E		426.0D	40	3		
	245	LEAR	43 NS	0945.3	1000.6	47.7D	75			
	410	LEAR	43 NS	0947.3	0947.8	45.7D	29			
	9400	TYKW	5 S	0017.0	0017.2	1.0	8	2.5		
	17000	NOBE	1 S	0030.9	0031.1	.4	15			L
	15400	LEAR	8 S	0031.0	0031.1	.6	22			
	8800	LEAR	8 S	0031.0	0031.1	.6	15			
	9400	TYKW	5 S	0031.0	0031.2	1.0	10	3		
	3750	TYKW	28 PRE	0048.0	0104.5	65.0	4	1.5		
	9400	TYKW	20 GRF	0055.0	0119	35.0	4	1		
	2000	TYKW	28 PRE	0125.0	0145	33.0	3	1.5		
	9400	TYKW	28 PRE	0130.0	0142	30.0	5	3		
	245	LEAR	8 S	0144.5	0144.8	.3	40			
	3750	TYKW	45 C	0153.0	0201.0	20.0	9	5		
	3750	TYKW		0153.0	0209.1		9			
	2000	TYKW	45 C	0158.0	0202.0	20.0	7	3		
	1000	TYKW	45 C	0158.0	0202.0	10.0	10	2		
	500	HIRA	45 C	0159.0	0201.9	8.0	6	3		0
	9400	TYKW	5 S	0200.0	0210	30.0	10	8		
	410	LEAR	8 S	0207.6	0207.8	.2	160			
	245	LEAR	8 S	0207.6	0207.8	.2	35			
	3750	TYKW	30 PBI	0213.0		115.0	5	1.5		
	2000	TYKW	29 PBI	0218.0		90.0	2	1		
	9400	TYKW	30 PBI	0230.0		95.0	6	3		
	410	LEAR	8 S	0251.8	0252.5	1.0	17			
	3750	TYKW	20 GRF	0304.0	0309	30.0	2	1		
	245	LEAR	8 S	0307.3	0307.5	.5	22			
	3750	TYKW	45 C	0400.0	0400.5	4.0	4	1		
	9400	TYKW	5 S	0400.2	0400.5	.8	6	1.5		
	3750	TYKW	20 GRF	0425.0	0440	60.0	6	2.5		
	9400	TYKW	21 GRF	0425.0	0443	65.0	6	3		
	2000	TYKW	20 GRF	0425.0	0440	50.0	2	1		
	9400	TYKW	5 S	0511.0	0511.8	3.0	4	1.5		
	3750	TYKW	21 GRF	0534.0	0610	65.0	2	1		
	9400	TYKW	20 GRF	0540.0	0551.5	30.0	8	3		
	3750	TYKW	5 S	0550.0	0550.4	1.0	2.5	.5		
	9400	TYKW	5 S	0619.0	0625	12.0	3	1.5		
	2000	TYKW	5 S	0624.3	0624.6	1.0	1	.3		
	1000	TYKW	45 C	0624.4	0624.6	1.0	33	4		
	9400	TYKW	5 S	0633.0	0641	18.0	4	2		
	245	LEAR	8 S	0705.6	0705.8	.4	65			
	245	LEAR	8 S	0739.0	0739.1	.1	45			
	930	BORD	41 F	0749.7	0749.7	.2	15	2		
	1470	POTS	40 F	0759.0	0801.5	6.0	7			
	650	GORK	1 S	0800.0	0801.7	4.3D	2.5			
	204	IZMI	5 S	0800.7	0801.0	.5	130	70		
	245	LEAR	8 S	0800.8	0800.8	1.0	110			
	234	POTS	4 S/F	0800.9	0801.0	.4	250	25		III
	113	POTS	4 S/F	0801.0	0801.1	.2	300	60		III
	410	LEAR	8 S	0801.5	0801.6	.3	54			
	127	TORN	45 C	0808.5	0811.3	4.0	140	30		
	245	LEAR	8 S	0826.1	0826.1	.5	47			
	200	GORK	28 PRE	0918.0	0935.0	31.0	18			
	100	GORK	27 RF	0921.0	1027.7	99.0	890	200		
	204	IZMI	25 R	0925.0	0954.2	65.0	100	40		
	1470	POTS		0925.0	1008		13			
	1470	POTS	20 GRF	0925.0	0950	325.0D	13			
	2950	GORK	20 GRF	0927.0	1023.5	200.0E	58			
	3000	POTS	23 GRF	0930.0	1115	320.0D	33			
	536	ONDR	41 F	0931.5	1021.2	68.0	15	6		
	650	GORK	28 PRE	0932.0	0933.6	6.7	47			
	3100	CRIM	20 GRF	0933.0	1010.0	109.0	17	4		
	245	LEAR	4 SF	0933.1	0933.8	4.7	60			
	606	LEAR	8 S	0933.3	0933.6	.8	75			
	6100	KISV	24 R	0935.0	1000		9			
	9500	POTS	23 GRF	0935.0	0959	315.0D	19			
	9100	GORK	21 GRF	0937.3	1009.1	151.0	17			
	228	HARS	27 RF	0943.0	0958 U	57.0U	60	25		
	200	GORK		0944.0	1008.0		110			
	200	GORK		0944.0	1000.5		60 D			
	650	GORK	23 GRF	0944.0	1000.8	68.2	5			
	200	GORK	46 C	0944.0	0954.3U	53.0	60 D			
	950	GORK	2 SF	0947.0	0950.0	5.0	8			
	810	KRAK	8 S	0947.5	0947.5	.1	16			
	650	GORK	46 C	0948.5	0949.5	8.8	6			
	650	GORK	46 C	0948.5	0954.5		6			
	930	BORD	46 C	0949.7	0950.2	2.3D	28	4		

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DAY OF MONTH	FREQUENCY	STATION	TYPE	STARTING TIME UT	TIME OF MAXIMUM UT	DURATION MINUTES	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1} PEAK	FLUX DENSITY MEAN	INT	POLARIZATION OR REMARKS
04	9100	GORK	1 S	0958.9	0959.2	1.3	20	10		
	650	GORK	1 S	1006.8	1007.9	2.0	5			
	650	GORK	4 S/F	1020.3	1021.5	2.7	10	5		
	930	BORD	41 F	1059.9	1100	.3	115	2		
	930	BORD	41 F	1115.8	1116.0	.4	36	2		
	9500	POTS	3 S	1142.4	1143.0	3.6	25			
	9100	GORK	1 S	1143.4	1143.8	1.8	12	6		
	930	BORD	8 S	1246.0	1246	.2	21	2		
	2800	OTTA	22 GRF	1310.0	1420	175.0	8.0			
	9500	POTS	3 S	1320.0	1320.4	1.5	22			
	9500	POTS	4 S/F	1432.5	1433.7	4.5	29			
	9400	HUAN	S	1432.6	1436.3	8.0	14.7	5.6		0
	930	BORD	41 F	1454.4	1454.6	.3	49	2		
	2800	OTTA	21 GRF	1640.0	1745	140.0	14.8	7.4		
	9400	HUAN	S	1718.9	1727.0	82.8	35.9	16.8		L
	2800	OTTA	3 S	1719.0	1724.2	23.0	30.0	12.0		
	8800	SGMR	4 SF	1719.1	1725.1	15.9	45			
	2800	OTTA	260 FAL	1910.0	2000	50.0	-5.0	-2.5		
	2800	OTTA	1 S	2018.0	2018.7	1.0	3.6	1.6		
	9400	TYKW	5 S	2237.0	2237.9	3.0	28	8		
	3750	TYKW	5 S	2237.0	2237.9	.5	3	1		
	9400	TYKW	30 PBI	2240.0		20.0	4	2		
	9400	TYKW	5 S	2244.0	2244.7	3.0	15	4		
	3750	TYKW	5 S	2307.0	2309.2	19.0	5	2		
	3750	TYKW	20 GRF	2330.0	0020	95.0	7	4		
	9400	TYKW	20 GRF	2330.0	2350	80.0	6	3		
	2000	TYKW	20 GRF	2330.0	2350	90.0	5	2.5		
05	245	LEAR	43 NS	0132.8	0325.8	367.2D	51			
	200	GORK	43 NS	0541.0		427.0D		5		
	100	GORK	44 NS	0615.0E		255.0D		5		
	606	LEAR	43 NS	0616.0	0624.8	84.0D	81			
	260	ONDR	44 NS	0800.0E		424.0D	11			
	200	HIRA	44 NS	2100.0E	2210	690.0D	55	10		
	245	LEAR	43 NS	2353.0	0321.1	638.0D	68			
	245	LEAR	8 S	0010.0	0010.1	.3	46			
	3750	TYKW	28 PRE	0115.0	0126	38.0	2	1.5		
	9400	TYKW	5 S	0125.0	0126.3	4.0	3	1		
	2000	TYKW	28 PRE	0147.0	0151	8.0	2	1.5		
	8800	LEAR	8 S	0150.8	0151.1	1.0	100			
	9400	TYKW	45 C	0153.0	0158.6	10.0	11	5		
	3750	TYKW	5 S	0153.0	0158.8	10.0	18	7		
	2000	TYKW		0155.0	0158.9		11			
	2000	TYKW	45 C	0155.0	0156.7	7.0	11	6		
	8800	LEAR	4 SF	0156.0	0158.8	6.0	23			
	1000	TYKW	5 S	0158.0	0158.8	2.0	8	2		
	4995	LEAR	4 SF	0158.1	0158.8	3.9	17			
	2000	TYKW	29 PBI	0202.0		50.0	5	3		
	9400	TYKW	29 PBI	0203.0		45.0	4	2		
	3750	TYKW	29 PBI	0203.0		50.0	6	3		
	245	LEAR	8 S	0255.8	0256.0	.3	40			
	3750	TYKW	20 GRF	0325.0	0338	45.0	2	1		
	2000	TYKW	20 GRF	0330.0	0333	40.0	2	1		
	9400	TYKW	45 C	0422.0	0424.2	8.0	35	8		
	3750	TYKW	5 S	0423.0	0424.3	7.0	8	2		
	2000	TYKW	28 PRE	0423.0	0448	35.0	2.5	1		
	17000	NOBE	20 GRF	0423.3	0424.2	60.0	14			0
	4995	LEAR	4 SF	0423.5	0424.3	3.5	13			
	8800	LEAR	8 S	0423.8	0424.1	1.2	33			
	15400	LEAR	8 S	0424.0	0424.1	.3	22			
	9400	TYKW	30 PBI	0430.0		80.0	6	3		
	3750	TYKW	28 PRE	0431.0	0442	26.0	5	2.5		
	9400	TYKW	45 C	0431.0	0441	20.0	14	6		
	3750	TYKW	5 S	0451.5	0452.5	3.5	1.5	.5		
	9400	TYKW	5 S	0451.5	0452.2	3.5	2	1		
	3750	TYKW	5 S	0457.0	0502.5	23.0	27	9		
	9400	TYKW	5 S	0457.0	0501.8	25.0	29	9		
	2000	TYKW	5 S	0458.0	0502.6	15.0	8	4.5		
	2000	TYKW	29 PBI	0513.0		35.0	4	2		
	3750	TYKW	30 PBI	0520.0		30.0	3	1.5		
	9400	TYKW	45 C	0524.0	0540.8	25.0	9	2		
	3750	TYKW	5 S	0525.0	0532	23.0	2.5	1.5		
	9100	GORK	23 GRF	0533.0E	0800.9	283.0D	29			
	2950	GORK	23 GRF	0533.0E	0800.9	243.0D	23			
	2000	TYKW	5 S	0553.0	0557	20.0	2	1	D	
	3750	TYKW	5 S	0553.0	0557	20.0	3	1.5	D	
	9400	TYKW	5 S	0555.0	0558	15.0	2	1	D	
	2000	TYKW	5 S	0602.3	0602.5	.5	5.5	1.5		
	950	GORK	21 GRF	0604.9	0627.0	50.9	4.4			
	9400	TYKW	21 GRF	0615.0	0626	45.0	8	3		
	200	GORK	27 RF	0616.0	0635.0	72.0	19			
	2000	TYKW	21 GRF	0617.0	0626	35.0	4	1.5		
	3750	TYKW	21 GRF	0617.0	0626	35.0U	7	3.5U		INTERFERENCE
	2000	TYKW	5 S	0620.0	0621.0	2.0	3	1		
	1000	TYKW	5 S	0620.0	0621	2.5	2.5	1		

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DAY OF MONTH	FREQUENCY	STATION	TYPE		STARTING TIME UT	TIME OF MAXIMUM UT	DURATION MINUTES	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1} PEAK	FLUX DENSITY MEAN	INT	POLARIZATION OR REMARKS
05	3750	TYKW	5	S	0633.0	0635.1	5.0	7	2		
	9400	TYKW	5	S	0633.0	0635.1	10.0	11	3.5		
	2000	TYKW	5	S	0633.0	0635.2	6.0	4.5	1.5		
	3100	CRIM	1	S	0634.0	0635.0	2.0	8	3		
	2950	GORK	1	S	0634.4	0635.0	1.9	5.0	2.5		
	950	GORK	1	S	0634.5	0635.2	2.0	4.5			
	1000	TYKW	5	S	0634.5	0635.4	2.5	5	1.5		
	650	GORK	1	S	0634.7	0636.0	2.3	5.5	2.6		
	2695	LEAR	8	S	0634.8	0635.1	.3	17			
	17000	NOBE	20	GRF	0707.6	0711.9	62.0D	29			0,SUNSET
	11800	BERN	3	S	0707.8	0711.6	10.0	82.0			
	8400	BERN	3	S	0707.8	0711.6	12.0	119.0			
	4995	MANI	4	SF	0708.0	0711.6	9.0D	130			
	15000	KISV	4	S/F	0708.0	0711.0	5.0	30			
	1415	MANI	4	SF	0708.5	0711.6	7.5D	20			
	3200	BERN	3	S	0708.5	0712.0	15.0	88.0			
	2695	MANI	4	SF	0708.6	0711.5	8.7D	98			
	5200	BERN	3	S	0708.8	0712.0	15.0	112.0			
	8800	MANI	4	SF	0709.0	0711.1	7.5	119			
	6100	KISV	4	S/F	0709.0	0711.7	17.0	63			
	9400	TYKW	45	C	0709.5	0711.7	6.5	96	40		
	1470	POTS	29	PBI	0709.5	0712.5	111.0	32			
	2000	TYKW	5	S	0709.5	0712.2	10.5	77	24		
	2950	GORK	3	S	0709.7	0712.0	6.4	66	D		
	1415	LEAR	4	SF	0709.8	0712.1	9.0	29			
	15400	LEAR	4	SF	0709.8	0711.8	4.2	39			
	9100	GORK	4	S/F	0709.9	0711.6	50.0	98			
	5730	IRKU	20	GRF	0710.0	0712.1	7.0	135	46		L
	3100	CRIM	3	S	0710.0	0712.0	8.0	114	38		
	3000	POTS	29	PBI	0710.0	0712	100.0U	106			
	9500	POTS	29	PBI	0710.0	0711.5	100.0U	79			
	3750	TYKW	5	S	0710.0U	0712.1	10.0U	107	35	U	INTERFERENCE
	4995	LEAR	4	SF	0710.0	0712.0	8.5	119			
	8800	LEAR	4	SF	0710.0	0711.6	11.0	119			
	2695	LEAR	4	SF	0710.1	0712.0	11.0	119			
	1000	TYKW	5	S	0711.0	0712.3	4.5	4	2		
	9400	TYKW	29	PBI	0716.0		50.0	15	7		
	3750	TYKW	29	PBI	0720.0		45.0	10	5		
	2000	TYKW	29	PBI	0720.0		40.0	8	3.5		
	3100	CRIM	26	FAL	0749.0	0900.0		20			
	1000	TYKW	42	SER	0804.4	0804.5	2.5	29	2	U	
	2000	TYKW	42	SER	0804.6	0805.5	1.0	9	.5	U	
	930	BORD	41	F	0809.8	0809.9	.2	18	2		
	228	HARS	45	C	0923.8	0924.0	1.5	140	68		
	127	TORN	41	F	0931.0	0941.0	12.0	80			
	127	TORN	2	S/F	1027.3	1027.5	.8	90	50		
	810	KRAK	8	S	1306.2	1306.5	.5	10			
	930	BORD	41	F	1512.3	1512.3	.4	14	1		
	410	SGMR	8	S	1517.8	1518.1	1.0D	74			
	245	SGMR	8	S	1518.0	1518.1	.8	110			
	2800	OTTA	260	FAL	1800.0	1820	20.0	-3.4	-1.7		
	2800	OTTA	1	S	2036.0	2036.3	1.0	4.8	1.4		
	2800	OTTA	21	GRF	2045.0	2200	240.0	21.6	10.8		
	2800	OTTA	21	GRF	2100.0	2120	45.0	18.0	12.2		
	2800	OTTA	1	S	2102.8	2103.2	1.0	5.2	3.4		
	2695	PALE	4	SF	2102.8	2111.3	26.2	28			
	1415	PALE	47	GB	2102.8	2103.3	3.5	44			
	8800	PALE	4	SF	2103.0	2116.6	26.0	38			
	4995	PALE	4	SF	2104.8	2120.6	24.2	28			
06	200	GORK	44	NS	0348.0E		488.0D		5		
	260	ONDR	44	NS	0752.0E		430.0D	37	2		
	3750	TYKW	20	GRF	0005.0	0040	80.0	3	1.5		
	9400	TYKW	45	C	0107.0	0108.7	4.0	6	1.5		
	9400	TYKW	45	C	0134.0	0141.4	15.0	20	8		
	3750	TYKW	45	C	0140.0	0148.0	10.0	4	2		
	8800	LEAR	4	SF	0140.0	0141.1	4.0	22			
	9400	TYKW	30	PBI	0149.0		180.0	6	3		
	3750	TYKW	30	PBI	0150.0		180.0	3	1.5		
	3750	TYKW	28	PRE	0154.0	0159.6	9.5	9	5		
	9400	TYKW	28	PRE	0157.0	0159.5	6.0	6	2		
	8800	LEAR	4	SF	0157.6	0159.5	2.9	20			
	4995	LEAR	8	S	0158.0	0159.3	.1	15			
	8800	LEAR	4	SF	0202.6	0205.3	5.0	130			
	9400	TYKW	45	C	0203.0	0205.4	5.0	115	30		
	3750	TYKW	45	C	0203.5	0205.4	6.5	24	10		
	2000	TYKW	5	S	0204.0	0205.4	2.0	4	1		
	5730	IRKU	21	GRF	0204.0	0205.5	3.0	56	27		L
	17000	NOBE	7	C	0204.0	0205.3	2.5	86			0
	4995	LEAR	4	SF	0204.1	0205.3	2.7	41			
	2695	LEAR	8	S	0204.1	0205.3	1.4	13			
	8800	PALE	8	S	0204.5	0205.3	1.6	110			
	15400	PALE	8	S	0204.6	0205.3	1.0	110			
	4995	PALE	8	S	0204.6	0205.3	1.0	28			
	2000	TYKW	29	PBI	0206.0		24.0	1	.5		

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06	9400	TYKW	29	PBI	0208.0		20.0	10	5		
	3750	TYKW	29	PBI	0210.0		20.0	5	2		
	3750	TYKW	28	PRE	0235.5	0236.2	5.5	3	1.5		
	9400	TYKW	28	PRE	0235.5	0256.1	4.5	13	3.5		
	8800	LEAR	8	S	0235.6	0236.3*	1.5	18			
	5730	IRKU			0235.8	0242.6		49			L
	5730	IRKU	42	SER	0235.8	0236.4	17.0	27			L
	5730	IRKU			0235.8	0245.7		54			L
	5730	IRKU			0235.8	0248.3		18			L
	4995	LEAR	8	S	0236.1	0236.3	.2	15			
	9400	TYKW	45	C	0240.0	0245.7	12.0	66	20		
	8800	LEAR	47	GB	0240.6	0245.6	12.7	82			
	17000	WOBE	7	C	0240.7	0245.5	53.0	29			0
	2695	LEAR	47	GB	0241.0	0245.3	4.3	11			
	2000	TYKW	45	C	0241.0	0245.6	9.0	6	2		
	3750	TYKW	45	C	0241.0	0245.7	11.0	22	10		
	4995	LEAR	47	GB	0241.1	0245.6	8.0	44			
	1000	TYKW	45	C	0241.5	0241.8	8.5	22	.7		
	35000	NAGO	20	GRF	0242.0	0301	59.0	14			
	15400	PALE	8	S	0245.1	0245.3	.2	33			
	4995	PALE	8	S	0245.1	0245.6	.5	21			
	8800	PALE	8	S	0245.1	0245.6	.5	30			
	2000	TYKW	29	PBI	0250.0		110.0	3	1.5		
	3750	TYKW	30	PBI	0252.0		95.0	6	3		
	9400	TYKW	30	PBI	0252.0		65.0	16	9		
	3750	TYKW	5	S	0303.0E	0307.2	25.0D	3	1.5D		
	9400	TYKW	5	S	0307.0E	0307.2	3.0D	6	U 2 D		
	245	LEAR	8	S	0351.8	0352.5	1.0	450			
	410	LEAR	8	S	0351.6	0352.6	1.2	08			
	3100	CRIM	26	FAL	0817.0	1010.0		11			
	200	GORK			1122.0	1130.0		23			
	200	GORK	46	C	1122.0	1126.4	15.0	23			
	127	TORN	7	C	1224.5	1225.4	1.0	120	60		
	810	KRAK	1	S	1224.5	1224.7	.5	7	3		
	127	TORN	45	C	1243.3	1244.3	3.5	480	80		
	650	GORK	2	S/F	1243.4	1244.0	5.4	4	2		
	2950	GORK	1	S	1243.5	1243.7	1.0	5.0	2.5		
	113	POTS	4	S/F	1243.6	1244.3	2.6	150	20		III
	950	GORK	2	S/F	1243.7	1246.3	3.3	1.8			
	430	KRAK	42	SER	1245.0	1245.5	1.5	320			
	2800	OTTA	22	GRF	1930.0		110.0	4.6			
	2695	PENT	20	GRF	2125.0	2225	135.0	5.2	3.9		
	100	HIRA	41	F	2127.7	2127.7	3.4	14000			ML
	245	LEAR	8	S	2341.0	2341.1	.5	21			
07	245	LEAR	43	NS	0138.0	0145.3	107.0	13			
	200	GORK	44	NS	0501.0E		409.0D		5		
	245	LEAR	43	NS	0608.5	0619.5	56.0	41			
	410	LEAR	43	NS	0704.5	0707.5	76.0	35			
	245	LEAR	43	NS	0735.5	0808.5	174.5D	45			
	260	ONDR	44	NS	0803.0E		427.0D	47	3		
	245	PALE	43	NS	2154.0	2210.6	389.0	20			
	245	LEAR	43	NS	2245.0	2247.3	705.0D	320			
	410	LEAR	43	NS	2245.0	2249.1	705.0D	45			
	245	LEAR	8	S	0108.0	0109.1	2.0	11			
	245	LEAR	8	S	0131.6	0192.0	.3	20			
	500	HIRA	46	C	0156.2	0156.4	2.3	1600	50		ML
	200	HIRA	46	C	0156.2	0156.5	1.7	4200	440		0
	2000	TYKW	42	SER	0156.2	0156.8	1.5	4	.7		
	3750	TYKW	42	SER	0156.3	0156.4	1.2	2	.5		
	1000	TYKW	45	C	0156.4	0156.6	3.0	49	3		
	410	LEAR	8	S	0156.5	0156.6	.3	300			
	606	LEAR	8	S	0156.5	0156.6	.3	139			
	100	HIRA	41	F	0156.5	0156.6	2.3	2000			0
	245	PALE	47	GB	0156.5	0156.6	1.3	1600			
	245	LEAR	47	GB	0156.5	0156.6	1.1	1900			
	606	PALE	8	S	0156.5	0156.6	.5	180			
	410	PALE	8	S	0156.5	0156.6	.6	310			
	410	LEAR	4	SF	0224.3	0224.8	20.7	05			
	245	LEAR	8	S	0224.3	0224.5	.3	160			
	245	LEAR	8	S	0517.0	0517.8	2.0	1[illegible]			
	100	GORK	8	S	0517.2	0517.5U	.8	45	D		
	2000	TYKW	28	PRE	0530.0	0610	41.0	4	1.5		
	3750	TYKW	28	PRE	0537.0	0538	33.0	3	2		
	2950	GORK	21	GRF	0606.0	0648.0	167.0	16			
	1415	ATHN	4	SF	0608.5	0630.1	30.8D	77			
	3750	TYKW	45	C	0610.0	0621.3	40.0U	118	45		INTERFERENCE
	2000	TYKW	45	C	0611.0	0621.2	38.0	145	50		
	3100	CRIM	28	PRE	0611.0	0617.0	6.0	11	4		
	1000	TYKW	45	C	0612.0	0630.3	30.0	28	10		
	4995	MANI	47	GB	0612.1	1621.8	28.9	94			
	2695	MANI	47	GB	0612.1	0621.0	34.7D	160			
	950	GORK	45	C	0612.4	0621.0	27.6	11			
	950	GORK			0612.4	0630.3		15			
	1415	MANI	47	GB	0612.6	0620.5	31.5D	56			

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DAY OF MONTH	FREQUENCY	STATION	TYPE		STARTING TIME	TIME OF MAXIMUM	DURATION	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1}		INT	POLARIZATION OR REMARKS
					UT	UT	MINUTES	PEAK	MEAN		
07	2695	ATHN	4	SF	0613.3	0621.3	28.2D	130			
	2695	LEAR	47	GB	0613.6	0621.1	38.9	170			
	3200	BERN	22	GRF	0614.0	0620.3	35.0	.0			ONLY PAPER REC
	5200	BERN	22	GRF	0614.0	0620.3	35.0	76.0			ONLY PAPER REC
	200	GORK	27	RF	0614.0	0625.0	34.0	22			
	650	GORK	20	GRF	0614.2	0630.0	24.1	3.5			
	9400	TYKW	45	C	0615.0	0632.9	30.0	40	25		
	2950	GORK			0615.1	0630.0		96			
	2950	GORK	45	C	0615.1	0621.2	26.4	130			
	9100	GORK	21	GRF	0616.1	0638.3	250.0	29			
	3100	CRIM			0617.0	0629.8		131			
	3100	CRIM	45	C	0617.0	0621.0	27.0	156	51		
	1415	LEAR	47	GB	0617.3	0630.0	20.3	76			
	100	GORK			0617.7	0637.0		430			
	100	GORK			0617.7	0631.6		700			
	100	GORK			0617.7	0625.5		45 D			
	100	GORK			0617.7	0622.7		45 D			
	100	GORK	41	F	0617.7	0618.5	19.5	45 D			
	4995	ATHN	4	SF	0618.3	0621.1	22.3D	55			
	15400	LEAR	47	GB	0618.5	0633.5	45.0	26			
	4995	LEAR	47	GB	0618.8	0621.1	31.2	76			
	8800	LEAR	47	GB	0619.5	0632.3	41.3	55			
	9100	GORK	45	C	0619.5	0622.3	18.4	30			
	9100	GORK			0619.5	0631.9		20			
	8800	ATHN	4	SF	0619.8	0623.1	19.8	27			
	17000	NOBE	20	GRF	0620.2	0634.2	80.0	19			0
	200	HIRA	46	C	0621.0	0624.3	18.6	11	4		0
	113	POTS	41	F	0624.0	0626.0	10.0	800			
	3100	CRIM	29	PBI	0643.9	0644.0	88.0	21	7		
	9400	TYKW	29	PBI	0645.0		90.0D	22	16 D		
	2000	TYKW	30	PBI	0649.0		70.0D	11	8 D		
	3750	TYKW	29	PBI	0650.0		80.0D	21 U	15 D		
	2000	TYKW	5	S	0654.0	0655.5	15.0	3	1		
	1000	TYKW	5	S	0659.0	0659.1	.5	2	.5		
	650	GORK	1	S	0713.5	0715.0	2.7	2			
	650	GORK	2	SF	0731.0	0731.5	1.3	2			
	430	KRAK	8	S	0817.0	0817.1	.3	28			
	3100	CRIM	26	FAL	0830.0	1036.0		11			
	536	ONDR	4	S/F	0935.5	0936.3	2.0	15	2		
	430	KRAK	8	S	0936.2	0936.3	.5	140			
	127	TORN	40	F	1039.0	1051.5	13.0	110			
	113	POTS	8	S	1250.4	1250.5	.1	100	30		III
	228	HARS	45	C	1558.1	1558.3	1.6	220	115		
	410	SGMR	8	S	1558.3	1558.8	1.0D	35			
	245	SGMR	47	GB	1558.3	1555.8	1.3	530			
	245	SGMR	4	SF	1715.6	1718.8	3.9	56			
	2800	OTTA	21	GRF	1740.0	1805	60.0	3.2	1.6		
	2800	OTTA	2	S/F	1802.9	1803	1.0	2.0	1.0		
	3750	TYKW	45	C	2246.0	2248.7	4.0	17	2.5		
	245	PALE	4	SF	2246.8	2247.3	2.5	450			
	2000	TYKW	45	C	2247.0	2248.3	3.0	22	2		
	410	PALE	4	SF	2247.1	2249.1	3.5	80			
	100	HIRA	41	F	2247.2	2251.1	6.4	256			ML
	500	HIRA	46	C	2248.0	2248.2	2.0	400	20		WL
	2695	PENT	2	S/F	2248.0	2248.8	2.0	8.0	2.8		
	1000	TYKW	45	C	2248.3	2248.7	1.5	23	7		
	9400	TYKW	5	S	2248.4	2248.8	1.6	14	5		
	2695	PALE	8	S	2248.5	2248.6	1.1	13			
	8800	PALE	8	S	2248.5	2248.6	1.3	19			
	606	PALE	8	S	2248.5	2248.6	.6	17			
	15400	PALE	8	S	2248.5	2248.6	.8	11			
	1415	PALE	8	S	2248.5	2248.6	1.1	13			
	4995	PALE	8	S	2248.5	2248.6	1.1	11			
	3750	TYKW	29	PBI	2250.0		20.0	3	1.5		
	9400	TYKW	29	PBI	2250.0		20.0	4	2		
08	200	GORK	44	NS	0357.0E		76.0D		5		
	260	ONDR	44	NS	0735.0E		444.0D	51	2		
	245	PALE	43	NS	1921.0	1925.6	52.5	90			
	410	PALE	43	NS	1924.1	1928.1	33.9	45			
	245	LEAR	43	NS	2315.5	2321.5	44.0	21			
	9400	TYKW	5	S	0030.0	0031.3	3.0	4	1.5		
	3750	TYKW	5	S	0112.0	0113.2	2.0	4	1.5		
	2000	TYKW	5	S	0113.0	0113.2	1.0	2	.7		
	3750	TYKW	29	PBI	0114.0		35.0	2	1		
	3750	TYKW	21	GRF	0156.0	0224	185.0	8	4		
	9400	TYKW	20	GRF	0200.0	0224	180.0	9	4		
	2000	TYKW	21	GRF	0200.0	0224	160.0	6	3		
	2000	TYKW	5	S	0205.0	0209.1	7.0	7	3		
	3750	TYKW	5	S	0205.0	0209.1	7.0	4	1.5		
	1000	TYKW	45	C	0205.0	0209.1	7.0	18	2		
	1415	LEAR	4	SF	0208.0	0209.0	3.8	11			
	4995	LEAR	4	SF	0208.0	0209.1	2.1	08			
	2695	LEAR	4	SF	0208.1	0209.0	2.2	10			
	17000	NOBE	20	GRF	0210.2	0233.5	62.0	9			0

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08	1000	TYKW	20 GRF	0230.0	0310	130.0	3	1.5		
	1000	TYKW	45 C	0500.0	0540	90.0	8	3		
	2000	TYKW	21 GRF	0510.0	0540	110.0	2	1		
	9400	TYKW	20 GRF	0510.0	0615	110.0	2	1		
	3750	TYKW	21 GRF	0510.0	0615	110.0U	4	2 U		INTERFERENCE
	606	LEAR	8 S	0543.5	0543.8	.6	13			
	2000	TYKW	5 S	0622.2	0622.4	.5	1 U	.3U		
	3750	TYKW	5 S	0622.2	0622.4	.5	6	2		
	3750	TYKW	45 C	0740.0	0742.3	6.5	4	1		
	2000	TYKW	45 C	0740.0	0745.3	7.0	12	3		
	2950	GORK	2 S/F	0740.3	0742.3	5.2	5.7			
	950	GORK	4 S/F	0740.4	0745.5	6.0	11			
	1000	TYKW	42 SER	0740.5	0745.5	6.0	20	3		
	1470	POTS	28 PRE	0740.5	0745.5	6.5	13			
	2695	LEAR	4 SF	0740.5	0745.3	5.3	13			
	3000	POTS	28 PRE	0741.0	0745.4	5.0	4.7			
	1415	LEAR	8 S	0745.1	0745.3	.7	18			
	234	POTS	4 S/F	0837.6	0837.9	.4	170	20		
	930	BORD	8 S	1238.4	1238.4	.2	14	2		
	2800	OTTA	20 GRF	1255.0	1305	87.0	3.0			
	234	POTS	4 S/F	1355.2	1355.3	.4	100	10		
	2800	OTTA	20 GRF	1427.0	1435	83.0	3.4	2.0		
	2800	OTTA	23 GRF	1620.0	1645	90.0	4.2	2.1		
	930	BORD	8 S	1635.0	1635.0	.2	22	2		
	2800	OTTA	8 S	1721.0	1721.3	.7	2.2	1.1		
	2800	OTTA	21 GRF	1850.0	1900	55.0	4.2	2.1		
	8800	SGMR	4 SF	1910.1	1911.1	2.9	13			
	9400	HUAN	S	1910.1	1911.0	2.1	12.4	6.2		R
	2695	SGMR	4 SF	1910.3	1911.1	2.5D	06			
	8800	PALE	8 S	1910.6	1911.1	1.5	29			
	4995	SGMR	8 S	1910.6	1911.1	1.4D	13			
	4995	PALE	8 S	1910.6	1911.1	.9	15			
	2800	OTTA	1 S	1910.7	1911	1.0	3.4	1.7		
	9400	HUAN	S	2022.4	2023.1	3.1	22.8	11.6		0
	2800	OTTA	2 S/F	2043.5	2044.1	1.5	4.2			
	2800	OTTA	20 GRF	2110.0	2120	20.0	2.2	1.1		
	1415	PALE	8 S	2118.3	2118.6	.7	20			
	410	PALE	8 S	2120.0	2120.1	.1	139			
	2000	TYKW	20 GRF	2225.0	2231	90.0	6	2		
	3750	TYKW	20 GRF	2225.0	2231	90.0	4	1.5		
09	245	LEAR	43 NS	0052.5	0320.6	576.5D	160			
	200	HIRA	43 NS	0114.0	0735	450.0D	55	7		WR
	200	GORK	44 NS	0537.0E		341.0D		10		
	204	IZMI	44 NS	0600.0E		360.0D	136			
	410	LEAR	43 NS	0641.1	0751.5	227.9D	40			
	260	ONDR	44 NS	0743.0E		444.0D	67	4		
	245	SGMR	43 NS	1110.0	1521.3	530.0D	139			
	245	PALE	43 NS	2000.0	2012.8	504.0D	119			
	100	HIRA	44 NS	2056.0E	2334	210.0D	110	45		MR
	200	HIRA	44 NS	2056.0E	2300	300.0D	115	50		MR
	245	LEAR	43 NS	2240.0E	0000.0	8.0U	00			
	3750	TYKW	5 S	0024.0	0024.8	3.0	4.5	1		
	1000	TYKW	45 C	0031.0	0031.4	1.0	11	2.5		
	3750	TYKW	20 GRF	0200.0	0250	150.0	5	2.5		
	2000	TYKW	20 GRF	0200.0	0250	150.0	2	1		
	9400	TYKW	20 GRF	0200.0U	0250 U	150.0U	6 U	2 U		RAIN
	410	LEAR	8 S	0555.6	0555.8	.7	24			
	410	LEAR	4 SF	0610.3	0612.3	2.3	68			
	4995	ATHN	4 SF	0610.8	0612.1	3.8D	17			
	3750	TYKW	5 S	0611.0	0612.3	3.0	22	6		
	2000	TYKW	5 S	0611.0	0612.3	4.0	7	2		
	3100	CRIM	3 S	0611.0	0612.2	3.0	18	6		
	2950	GORK	1 S	0611.1	0612.3	2.4	14			
	2695	ATHN	8 S	0611.5	0612.1	1.8D	21			
	9100	GORK	1 S	0611.6	0612.3	3.3	9	4.5		
	1000	TYKW	5 S	0611.8	0612.5	2.0	2	.7		
	8800	LEAR	8 S	0611.8	0612.3	1.7	11			
	9400	TYKW	5 S	0612.0	0612.3	2.0	4	2		
	8800	ATHN	8 S	0612.1	0612.6	1.7	07			
	2695	LEAR	8 S	0612.1	0612.1	.2	16			
	4995	LEAR	8 S	0612.1	0612.1	.2	23			
	3750	TYKW	29 PBI	0614.0		15.0	1.5	.7		
	3100	CRIM	26 FAL	0626.0	0736.0		8			
	410	LEAR	8 S	0632.6	0632.6	.2	77			
	536	ONDR	4 S/F	0812.8	0814	2.0	56	3		
	930	BORD	46 C	0831.0	0832.1	4.0	72	7		
	810	KRAK	7 C	0843.0	0843.5	.8	25	3		
	410	LEAR	8 S	0843.1	0844.1	1.2	230			
	650	GORK	4 S/F	0843.3	0844.0	.8	14	3.5		
	930	BORD	41 F	0843.4	0844.0	.6	64	3		
	606	LEAR	8 S	0843.5	0844.1	.8	23			
	536	ONDR	2 S/F	0843.5	0844.2	1.0	29	2		
	1415	LEAR	8 S	0843.8	0844.1	.5	07			
	1470	POTS	8 S	0844.0	0844.2	.5	6.6			

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09	930	BORD	8	S	0933.0	0933	.1	66	1		
	3100	CRIM	21	GRF	1022.0	1031.0	86.0	8	3		
	2950	GORK	20	GRF	1022.7	1031.0	94.0	7			
	1470	POTS	20	GRF	1025.0	1031.5	83.0	5			
	9500	POTS	20	GRF	1025.0	1040	105.0	5			
	3000	POTS	20	GRF	1025.0	1103.5	95.0	25			
	650	GORK	40	F	1027.4	1032.3	7.3	3.5			
	9100	GORK	20	GRF	1030.3	1039.0	20.2	8			
	5200	BERN	3	S	1102.8	1103.3	10.0	18.0			ONLY PAPER REC
	3200	BERN	3	S	1102.8	1103.3	10.0	.0			ONLY PAPER REC
	3100	CRIM	1	S	1103.0	1103.5	2.0	3	1		
	1470	POTS	1	S	1424.0	1424.5	1.5	5			
	930	BORD	8	S	1534.2	1534.3	.2	15	2		
	2800	OTTA	21	GRF	1835.0	1930	260.0	18.4	8.8		
	2800	OTTA	1	S	1837.0	1839	4.0	6.2	3.1		
	9400	HUAN		S	1842.5	1901.4	84.2	13.5	9.1		0
	2800	OTTA	1	S	1846.5	1849.6	6.5	6.6	3.4		
	2800	OTTA	1	S	2157.8	2158.4	1.5	3.6	1.4		
10	200	GORK	44	NS	0352.0E		128.0D		10		
	260	ONDR	44	NS	0752.0E		433.0D	34			
	245	LEAR	43	NS	2241.0	0600.1	706.0D	33			
	1000	TYKW	8	S	0016.8	0016.9	.2	11	4		
	1415	MANI	4	SF	0019.0	0021.5	2.6D	20			
	4995	MANI	8	S	0020.0	0031.5	1.6	08			
	606	MANI	4	SF	0020.0	0021.5	2.1D	05			
	2695	MANI	4	SF	0020.0	0021.5	11.6D	06			
	1000	TYKW	45	C	0020.0	0021.3	2.0	8	1.5		
	3750	TYKW	5	S	0020.3	0021.2	1.5	5	1.5		
	9400	TYKW	5	S	0020.5	0021.2	1.0	9	2.5		
	2000	TYKW	5	S	0021.0	0021.2	.6	4.5	1.5		
	1000	TYKW	42	SER	0026.0	0026.6	.7	15	1.5		
	2000	TYKW	28	PRE	0239.0	0244	5.0	3	1.5		
	9400	TYKW	5	S	0243.0	0245.2	14.0	6	2		
	3750	TYKW	45	C	0243.0	0245.4	6.0	11	3.5		
	1000	TYKW	45	C	0244.0	0247.0	6.0	15	3.5		
	2000	TYKW	45	C	0244.0	0245.4	4.0	12	5		
	500	HIRA	46	C	0244.3	0246.5	3.0	23	8		MR
	4995	LEAR	8	S	0244.6	0245.1	.2	16			
	2000	TYKW	29	PBI	0248.0		10.0	2	1		
	3750	TYKW	29	PBI	0249.0		10.0	1	.5		
	2000	TYKW	21	GRF	0313.0	0457.8	150.0	3.5	1		
	3750	TYKW	5	S	0313.0	0314.3	5.0	2.5	1		
	3750	TYKW	20	GRF	0320.0	0355	70.0	2	1		
	9400	TYKW	5	S	0329.0	0329.3	2.0	2	1		
	2000	TYKW	20	GRF	0330.0	0355	50.0	1.5	.5		
	9400	TYKW	20	GRF	0340.0	0355	40.0	2	1		
	3750	TYKW	21	GRF	0435.0	0457.8	60.0	6	1.5		
	9400	TYKW	20	GRF	0440.0	0501	60.0	3	1.5		
	3750	TYKW	5	S	0447.3	0447.7	1.0	1.5	.5		
	410	LEAR	8	S	0529.6	0529.8	.7	67			
	3750	TYKW	5	S	0615.0	0622	25.0	3	1		
	2000	TYKW	5	S	0615.0	0622	25.0	1.5	.5		
	9400	TYKW	5	S	0620.0	0622	15.0	2	1		
	2950	GORK	21	GRF	0829.5	0834.7	24.0	3.8			
	9500	POTS	20	GRF	0830.0	0832.8	15.0	6			
	228	HARS	6	S	0830.4	0831.8	2.5	140 D	25		
	2695	MANI	4	SF	0830.5	0832.8	4.1D	45			
	4995	MANI	4	SF	0830.6	0832.1	4.0	30			
	1415	MANI	4	SF	0831.0	0832.8	3.1D	43			
	29	UPIC	2	S/F	0831.0	0831.4	.5				
	606	MANI	4	SF	0831.0	0831.8	2.6D	31			
	2650	DWIN	1	S	0831.0	0832	4.0	40	20		
	260	ONDR	45	C	0831.0	0832.3	2.5	148	42		
	5200	BERN	3	S	0831.1	0832.5	28.0	23.0			ONLY PAPER REC
	3200	BERN	3	S	0831.1	0832.5	28.0	.0			ONLY PAPER REC
	536	ONDR	45	C	0831.3	0832.3	4.0	45	9.5		
	3100	CRIM	3	S	0831.5	0832.5	3.0	26	8		
	808	ONDR	2	S/F	0831.5	0831.9	2.5	18	7		
	2950	GORK	3	S	0831.5	0832.5	3.3	26			
	1470	POTS	4	S/F	0831.5		2.5				
	3000	POTS	3	S	0831.5	0832.5	3.5	25			
	2695	ATHN	4	SF	0831.5	0832.6	12.0D	35			
	430	KRAK	4	S/F	0831.5	0831.6	2.0	500 U	20 U		
	810	KRAK	2	S/F	0831.5	0832.5	2.0	24	8		
	3000	IZMI	5	S	0831.7	0833.0	3.3	36	16		
	9100	GORK	1	S	0831.8	0832.8	2.9	5	2.5		
	204	IZMI	5	S	0831.8	0831.8	.8	190	120		
	1415	ATHN	4	SF	0831.8	0832.6	10.8D	40			
	4995	ATHN	4	SF	0831.8	0832.6	3.8D	15			
	410	LEAR	8	S	0831.8	0832.6	1.2	39			
	245	LEAR	47	GB	0831.8	0832.1	1.0	510			
	8800	ATHN	4	SF	0831.8	0832.8	9.8	06			
	2695	LEAR	8	S	0832.1	0832.5	1.4	39			
	1415	LEAR	8	S	0832.1	0832.5	.5	46			

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DAY OF MONTH	FREQUENCY	STATION	TYPE		STARTING TIME	TIME OF MAXIMUM	DURATION	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1}		INT	POLARIZATION OR REMARKS
					UT	UT	MINUTES	PEAK	MEAN		
10	4995	LEAR	8	S	0832.1	0832.6	.9	21			
	606	LEAR	8	S	0832.3	0832.6	.5	34			
	234	POTS	4	S/F	0832.6	0833.0	1.3	575	30		
	650	GORK	46	C	1011.4	1012.9	2.8	23			
	650	GORK			1011.4	1014.0		15			
	810	KRAK	42	SER	1011.7	1013.0	2.2	36			
	3100	CRIM	26	FAL	1036.0	1200.0		7			
	2800	OTTA	1	S	1340.0	1440.5	1.2	2.2	1.1		
	3200	BERN	3	S	1341.8	1342.3	8.0	.0			ONLY PAPER REC
	5200	BERN	3	S	1341.8	1342.3	8.0	12.0			ONLY PAPER REC
	3000	POTS	3	S	1342.0	1342.5	3.0	11			
	1470	POTS	1	S	1342.0	1342.4	1.0	3.3			
	9500	POTS	1	S	1342.0	1342.5	1.5	5			
	2800	OTTA	1	S	1342.3	1342.7	3.5	9.0	2.2		
	2800	OTTA	1	S	1514.0	1514.3	1.0	2.2	1.1		
	2800	OTTA	1	S	1610.3	1611.3	1.5	1.8	.9		
	2800	OTTA	1	S	1923.5	1924.2	1.8	1.8	.9		
	2800	OTTA	8	S	2025.8	2025.8	.3	3.6	1.8		
	2800	OTTA	20	GRF	2100.0	2115	95.0	3.6	2.9		
	2000	TYKW	5	S	2248.0	2248.3	1.0	3	1		
	1000	TYKW	5	S	2248.0	2248.3	1.0	6	2		
	3750	TYKW	5	S	2248.0	2248.3	1.0	1.5	.5		
	9400	TYKW	5	S	2248.0	2248.3	1.0	3	1.5		
	3750	TYKW	45	C	2342.0	2345.4	25.0	3	1		
11	245	LEAR	43	NS	2241.0	0600.1	706.0D	33			
	3750	TYKW	5	S	0009.0	0010.1	8.0	4	1		
	3750	TYKW	21	GRF	0009.0	0130	120.0	4	2		
	200	HIRA	46	C	0013.0	0014.3	3.0	170	45		WR
	100	HIRA	45	C	0013.0	0013.3	1.0	290	92		0
	2000	TYKW	5	S	0018.0	0018.5	1.0	1	.5		
	410	LEAR	8	S	0057.0	0057.1	.5	01			
	9400	TYKW	5	S	0113.0	0113.8	2.0	18	4		
	606	LEAR	8	S	0113.3	0133.8	1.2	46			
	410	LEAR	8	S	0113.3	0113.6	.7	09			
	2695	PENT	4	S/F	0113.5	0113.9	2.0	18.0	6.0		
	1000	TYKW	5	S	0113.5	0114.0	3.5	14	3.5		
	2000	TYKW	5	S	0113.5	0113.8	2.5	18	8		
	3750	TYKW	5	S	0113.5	0113.9	1.5	16	5		
	2695	LEAR	8	S	0113.6	0113.8	.9	15			
	8800	PALE	8	S	0113.6	0113.8	.4	25			
	2695	PALE	8	S	0113.6	0113.8	.4	24			
	8800	LEAR	8	S	0113.6	0113.8	.9	20			
	4995	LEAR	8	S	0113.6	0113.8	.9	11			
	1415	PALE	8	S	0113.6	0113.8	.5	19			
	4995	MANI	8	S	0113.6	0114.1	1.4D	21			
	15400	LEAR	8	S	0113.6	0113.8	.9	11			
	606	PALE	8	S	0113.6	0113.8	.4	77			
	1415	LEAR	8	S	0113.6	0113.8	.9	11			
	4995	PALE	8	S	0113.6	0113.8	.4	19			
	606	MANI	4	SF	0113.6	0121.8	9.9D	56			
	2695	MANI	8	S	0113.8	0114.1	1.3D	24			
	8800	MANI	8	S	0113.8	0114.3	1.2	19			
	1415	MANI	8	S	0114.0	0114.3	1.6D	24			
	9400	TYKW	45	C	0120.0	0123.0	4.0	13	4		
	2000	TYKW	45	C	0120.0	0121.7	4.0	18	5		
	1000	TYKW	45	C	0120.7	0121.6	3.5	34	9		
	3750	TYKW	45	C	0120.7	0123.0	3.3	8	3.5		
	606	LEAR	8	S	0121.3	0121.5	.3	38			
	410	LEAR	8	S	0121.3	0121.5	.3	130			
	9400	TYKW	29	PBI	0124.0		15.0	2	1		
	3750	TYKW	21	GRF	0215.0	0335	190.0	5	2.5		
	2000	TYKW	21	GRF	0220.0	0340	180.0	4	2		
	9400	TYKW	20	GRF	0240.0	0257	40.0	4	1.5		
	606	LEAR	8	S	0253.8	0254.5	.8	49			
	4995	LEAR	8	S	0254.0	0254.8	.6	10			
	2695	LEAR	8	S	0254.0	0254.8	.6	13			
	8800	LEAR	8	S	0254.0	0254.8	.6	07			
	1000	TYKW	5	S	0254.0	0254.8U	.8D	2	.7D		
	3750	TYKW	45	C	0254.0	0254.7	6.0	7	2		
	1415	LEAR	8	S	0254.5	0254.8	.1	15			
	2000	TYKW	45	C	0255.0E	0255.0U	6.0D	4	1 D		
	606	LEAR	8	S	0323.6	0324.0	1.2	13			
	2000	TYKW	5	S	0323.8	0324.1	1.5	1.5	.5		
	2000	TYKW	8	S	0330.0	0330.1	.4	16	5		
	9400	TYKW	21	GRF	0330.0	0400	70.0	2	1		
	9400	TYKW	5	S	0405.0	0408.3	20.0	5	1		
	3750	TYKW	5	S	0407.5	0408.2	1.5	1.5	.5		
	2000	TYKW	5	S	0407.7	0408.3	1.5	1.5	.5		
	1000	TYKW	5	S	0408.0	0408.1	.6	7	1		
	3750	TYKW	20	GRF	0605.0	0625	40.0U	3	1.5		INTERFERENCE
	2000	TYKW	21	GRF	0608.0E	0625	50.0D	3	1.5D		
	245	LEAR	8	S	0611.5	0611.8	.5	33			
	410	LEAR	8	S	0611.8	0611.8	.2	45			
	606	LEAR	4	SF	0611.8	0611.8	503.6	13			

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11	245	LEAR	8	S	0613.8	0614.1	.3	49			
	410	LEAR	8	S	0613.8	0614.3	.5	45			
	3100	CRIM	26	FAL	0636.0	0750.0		8			
	2000	TYKW	5	S	0653.6	0654.0	1.0	1.5	.5		
	2950	GORK	20	GRF	0715.0	0730.0	45.0	3	1.5		
	950	GORK	2	S/F	0722.0	0723.9	2.5	9			
	9400	TYKW	5	S	0722.0	0724	10.0	8	3		
	3750	TYKW	5	S	0722.0	0724	4.0	3	1		
	2000	TYKW	45	C	0722.0	0723.9	4.0	4	1		
	9100	GORK	22	GRF	0722.3	0724.1	9.5	11			
	1470	POTS	2	S/F	0722.5	0723.5	2.5	4.7			
	3000	POTS	1	S	0722.5	0724.0	3.5	3.2			
	650	GORK	40	F	0722.6	0723.9	1.7	21			
	1000	TYKW	45	C	0723.0	0723.9	2.0	24	2.5		
	234	POTS	41	F	0742.1	0742.2	1.1	450	15		
	245	LEAR	47	GB	0742.1	0742.3	1.2	740			
	410	LEAR	8	S	0742.1	0742.3	1.2	119			
	606	LEAR	8	S	0743.1	0743.1	.4	390			
	260	ONDR	42	SER	0810.0	0831.6	24.0	142			
	245	LEAR	8	S	0831.3	0831.6	.5	300			
	430	KRAK	8	S	0831.3	0831.7	.7	60 U			
	410	LEAR	8	S	0831.3	0831.5	.5	45			
	204	IZMI	8	S	0831.5	0831.5	.3	190	120		
	234	POTS	8	S	0831.5	0831.5	.2	215	75		
	430	KRAK	8	S	0840.5	0840.5	.2	14 U			
	3000	POTS	20	GRF	0940.0	1035	190.0	20			
	1470	POTS	20	GRF	0943.0	1130	247.0	12			
	650	GORK	46	C	0944.8	0950.3	21.2	30			
	650	GORK			0944.8	0954.2U		45 D			
	650	GORK			0944.8	0955.6U		45 D			
	536	ONDR	46	C	0945.0	0954.8	18.0	56	23		
	2950	GORK	21	GRF	0945.0	1100.0	170.0E	21			
	606	LEAR	47	GB	0949.8	0954.3	9.3	150			
	9100	GORK	20	GRF	0953.4	1145.3	157.0E	25			
	3100	CRIM	20	GRF	0953.5	1100.0	187.0D	18	6		
	430	KRAK	7	C	0954.0	0955.7	5.0	20 U	7 U		
	9500	POTS	20	GRF	0955.0	1130	165.0	22			
	260	ONDR	42	SER	1034.0	1036.8	91.0	40			
	113	POTS	8	S	1040.7	1040.8	.2	120	40		III
	1470	POTS	3	S	1112.5	1113.5	1.5	15			
	950	GORK	2	S/F	1143.0	1145.2	3.0	8			
	650	GORK	4	S/F	1143.2	1145.1	2.8	46	1		
	2950	GORK	1	S	1143.3	1145.1	2.8	5	2.5		
	1470	POTS	4	S/F	1143.5	1145.0	3.0	47			
	3000	POTS	3	S	1143.5	1145.0	2.5	7.8			
	260	ONDR	42	SER	1232.0	1432	120.0	20			
	2800	OTTA	260	FAL	1525.0	1545	80.0	-6.6	-3.3		
	2800	OTTA	20	GRF	1705.0	1712	25.0	3.6	1.8		
	2800	OTTA	21	GRF	1738.0	1820	77.0	4.0	2.0		
	245	SGMR	4	SF	1749.8	1750.6	2.5D	200			
	410	PALE	8	S	1749.8	1750.3	1.0	45			
	245	PALE	8	S	1749.8	1750.6	1.3	210			
	410	SGMR	8	S	1750.1	1750.3	.7D	25			
	1415	SGMR	8	S	1750.3	1750.6	.8	27			
	1415	PALE	8	S	1750.5	1750.6	.5	30			
	2800	OTTA	8	S	1801.9	1802	.8	2.0	1.0		
	2800	OTTA	20	GRF	1914.0		12.0	2.0	1.4		
	2800	OTTA	2	S/F	1935.5	1936.8	2.5	3.2			
	2695	PENT	20	GRF	2235.0	2244	30.0	4.0	2.0		
	3750	TYKW	20	GRF	2237.0	2243	30.0	5	2.5		
	9400	TYKW	5	S	2240.0	2245	25.0	3	1.5		
	2000	TYKW	5	S	2241.2	2241.6	1.0	12	4		
12	260	ONDR	43	NS	0834.6		393.0D	71			
	245	SGMR	43	NS	1105.0	1200.0	535.0D	139			
	3750	TYKW	45	C	0134.5	0135.5	2.5	7	2		
	2000	TYKW	5	S	0135.0	0135.5	2.0	4	1		
	1000	TYKW	45	C	0135.2	0135.3	.8	5	1.5		
	3750	TYKW	20	GRF	0250.0	0315	110.0	9	2		
	2000	TYKW	20	GRF	0250.0	0315	70.0	3	1		
	9400	TYKW	20	GRF	0300.0	0316	50.0	4	2		
	1000	TYKW	45	C	0323.0	0324.1	2.0	5	1.5		
	3750	TYKW	5	S	0512.0	0512.6	3.0	1	.3		
	2000	TYKW	45	C	0512.0	0513.2	1.5	4	1		
	1000	TYKW	45	C	0512.0	0513.0	1.5	3	1		
	410	LEAR	8	S	0512.3	0512.8	.7	95			
	606	LEAR	8	S	0512.5	0512.6	.5	11			
	1415	LEAR	8	S	0512.5	0513.1	.8	07			
	2000	TYKW	20	GRF	0533.0	0544	70.0	5	2		
	3750	TYKW	21	GRF	0533.0	0550	110.0	4	2		
	9400	TYKW	20	GRF	0533.0	0550	90.0	6	2.5		
	2950	GORK	20	GRF	0534.0	0654.0	43.0	8.3	4.0		
	3750	TYKW	5	S	0543.0	0544	3.0	2	.5		
	3100	CRIM	26	FAL	0635.5	0740.0		11			
	2000	TYKW	45	C	0650.0	0654.0	10.0	5	1		

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12	3750	TYKW	45 C	0650.0	0653.9	10.0U	6 U	1 U		INTERFERENCE
	9100	GORK	20 GRF	0651.6	0653.9	11.3	7	3.5		
	3100	CRIM	1 S	0653.0	0653.3	1.0	7	2		
	1000	TYKW	5 S	0653.8	0654.0	1.5	2	.5		
	2950	GORK	20 GRF	0754.0	1126.3	280.0E	3.3	4.0		
	1470	POTS	20	1000.0	1012.5	180.0	5.5			
	3000	POTS	20	1004.0	1024	121.0	8.2			
	3100	CRIM	20 GRF	1005.0	1033.5	56.0	8	3		
	29	UPIC	8 S	1129.8	1130	.5				
	650	GORK	4 S/F	1157.1	1158.0	3.2U	40			
	1470	POTS	42	1159.5	1200.2	5.0	13			
	930	BORD	41 F	1159.8	1200.2	.4	47	2		
	234	POTS	4 S/F	1200.0	1200.1	.3	150	15		
	29	UPIC	4 S/F	1333.3	1333.7	.6				
	930	BORD	8 S	1341.8	1341.8	.1	14	1		
	930	BORD	8 S	1440.4	1440.4	.1	21	1		
	245	SGMR	4 SF	1746.3	1748.1	2.5D	35			
	2695	SGMR	4 SF	1746.6	1750.1	6.7D	37			
	1415	PALE	4 SF	1746.8	1749.8	4.5	100			
	606	SGMR	4 SF	1747.0	1750.5	4.1D	18			
	2695	PALE	4 SF	1747.0	1750.1	4.5	40			
	2800	OTTA	4 S/F	1747.0	1750.2	4.3	41.0			
	1415	SGMR	4 SF	1747.1	1749.6	4.0D	100			
	4995	SGMR	4 SF	1747.3	1748.8	2.8	15			
	4995	PALE	4 SF	1747.6	1749.1	603.0	35			
	9400	HUAN	S	1747.8	1801.0	65.9	13.1	7.1		0
	2800	OTTA	29 PBI	1751.3	1751.3	180.0	16.6			
	100	HIRA	42 SER	2241.2	2247.2	10.6	910			
13	245	LEAR	43 NS	0220.0	0907.6	485.0D	40			
	260	ONDR	44 NS	0803.0E		423.0D	50			
	200	HIRA	44 NS	2050.0E	0500	710.0D	40	15		MR
	245	LEAR	44 NS	2242.0E	2346.1	648.5U	90			
	410	LEAR	8 S	0319.8	0320.0	.3	20			
	245	LEAR	8 S	0323.6	0324.0	.5	139			
	100	HIRA	46 C	0424.0	0424.2	1.4	120	41		0
	204	IZMI	4 S/F	0653.5	0654.5	1.8	90	70		
	2000	TYKW	45 C	0653.5	0655.1	2.0	65	10		
	1470	POTS	4 S/F	0654.0	0655.4	1.5	9			
	2950	GORK	20 GRF	0654.0	0704.8	31.0	3.5	1.7		
	410	LEAR	8 S	0654.1	0655.3	.7	23			
	245	LEAR	8 S	0654.3	0654.6	1.0	119			
	1415	LEAR	8 S	0655.1	0655.1	.2	18			
	1000	TYKW	8 S	0655.2	0655.3	.2	3	1		
	2950	GORK	20 GRF	0922.0	0933.6	180.0E	11.7			
	1470	POTS	28 PRE	0930.0	0933.5	5.5	6			
	3000	POTS	28 PRE	0930.0	0933.4	6.0	10			
	9100	GORK	20 GRF	0932.3	1016.3	155.0	10			
	3100	CRIM	1 S	0933.0	0934.3	4.0	11	4		
	3100	CRIM	20 GRF	1007.0	1015.5	19.0	8	3		
	650	GORK	1 S	1009.2	1012.3	5.5	3			
	3100	CRIM	20 GRF	1042.5	1045.0	8.0	6	2		
	113	POTS	4 S/F	1044.2	1044.3	.2	100	20		III
	2800	OTTA	1 S	1333.0	1333.5	1.0	2.4	1.2		
	930	BORD	46 C	1532.0	1534.2	4.0	20	3		
	2800	OTTA	240 R	1640.0	1700	20.0	4.0	3.0		
	2800	OTTA	21 GRF	1725.0	1820	105.0	6.0	3.0		
	9400	HUAN	S	1824.8	1844.5	42.4	11.8	4.3		0
	2800	OTTA	1 S	1825.0	1826	6.0	4.2	2.0		
	2800	OTTA	1 S	1831.5	1832.8	6.0	4.2	1.6		
	2800	OTTA	20 GRF	1920.0	1936	30.0	2.8	1.4		
	2800	OTTA	4 S/F	2057.0	2059	6.0	305.0	84.0		
	9400	HUAN	S	2057.8	2058.5	1.6	99.9	53.3		R
	1415	PALE	4 SF	2058.1	2059.5	7.4	130			
	2695	PALE	4 SF	2058.1	2058.8	7.4	350			
	4995	PALE	4 SF	2058.3	2058.8	7.2	119			
	8800	PALE	4 SF	2058.5	2058.6	7.0	130			
	15400	PALE	4 SF	2058.8	2059.0	6.7	39			
	9400	HUAN	29 PBI	2059.4	2059.4	41.6	29.4	8.5		R
	2800	OTTA	30 PBI	2103.0	2103	240.0	33.0			
	3750	TYKW	5 S	2234.0	2236.0	4.0	16	4		
	9400	TYKW	5 S	2235.0U	2236.0	3.0U	12 U	3 U		RAIN
	2695	PENT	1A S	2235.0	2239	10.0	4.2	2.1		
	2695	PENT	1 S	2235.2	2236.2	2.0	6.0	3.0		
	2000	TYKW	5 S	2235.7	2236.2	1.0	3	1		
	3750	TYKW	29 PBI	2238.0		15.0	6	3		
	3750	TYKW	45 C	2308.0	2314.9	32.0	37	12		
	9400	TYKW	45 C	2310.0U	2312.2	30.0U	225 U	30 U		RAIN
	8800	MANI	4 SF	2310.6	2312.3	3.0	340			
	4995	LEAR	47 GB	2310.6	2312.1	11.4	84			
	35000	NAGO	20 GRF	2311.0	2326	45.0	7			
	4995	MANI	4 SF	2311.0	2312.3	2.3D	96			
	8800	LEAR	47 GB	2311.1	2312.1	10.9	270			
	15400	LEAR	47 GB	2311.6	2312.1	4.4	160			
	2695	PENT	21 GRF	2312.0	2325	45.0	9.0	4.5		

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13	2695	MANI	47 GB	2312.0	2315.0	8.0D	56			
	8800	PALE	47 GB	2312.8	2313.8	11.5	84			
	4995	PALE	47 GB	2312.8	2319.0	11.5	48			
	15400	PALE	47 GB	2312.8	2314.1	4.3	50			
	2000	TYKW	5 S	2313.0	2314.9	3.0	9	3.5		
	1415	MANI	4 SF	2313.5	2314.3	2.5D	15			
	2695	PENT	45 C	2314.0	2314.9	7.0	15.0	7.0		
	2695	LEAR	4 SF	2314.1	2318.8	5.9	24			
	1415	LEAR	8 S	2314.1	2314.5	1.7	16			
	1415	PALE	47 GB	2314.1	2314.3	1.2	19			
	1000	TYKW	5 S	2314.2	2314.4	2.0	3	1		
	2695	PALE	8 S	2314.3	2314.8	.7	22			
	2000	TYKW	29 PBI	2316.0		90.0	4	2		
	3750	TYKW	29 PBI	2340.0		40.0	8	4		
	9400	TYKW	29 PBI	2340.0		40.0U	25 U	10 U		
14	100	HIRA	43 NS	0420.0	0505	200.0D	30	10		MR
	100	GORK	44 NS	0457.0E		183.0D		5		
	200	GORK	44 NS	0503.0E		345.0D		5		
	127	TORN	43 NS	0800.0	1019.8	440.0	180	9		V1
	260	ONDR	44 NS	0900.0E		365.0D	29			
	200	HIRA	44 NS	2050.0E	0418	710.0D	20	5		0
	245	LEAR	43 NS	2242.0	0155.6	701.0D	85			
	3750	TYKW	21 GRF	0210.0	0305	130.0	6	3		
	2000	TYKW	20 GRF	0220.0	0247	90.0	3	1.5		
	9400	TYKW	21 GRF	0220.0	0330	110.0	5	2		RAIN
	3750	TYKW	5 S	0220.3	0220.8	1.5	1.5	.5		
	3750	TYKW	5 S	0314.0	0319.6	25.0	11	2.5		
	410	LEAR	8 S	0314.1	0314.1	.4	160			
	9400	TYKW	45 C	0318.0	0321.4	10.0	11	2		
	4995	LEAR	8 S	0319.1	0319.3	.5	18			
	8800	LEAR	47 GB	0319.1	0319.5	3.0	09			
	245	LEAR	4 SF	0422.5	0500.0	77.5	29			
	4995	ATHN	4 SF	0501.5	0521.3	25.8D	39			
	8800	ATHN	4 SF	0507.3	0521.8	15.5	45			
	2695	ATHN	4 SF	0509.1	0521.3	20.9D	35			
	2000	TYKW	20 GRF	0513.0	0530	100.0	2	1		
	3750	TYKW	5 S	0513.0	0516.0	5.0	7	4		
	9400	TYKW	5 S	0514.0	0516	25.0	3	1		
	1415	ATHN	4 SF	0514.1	0522.0	7.2D	20			
	3750	TYKW	29 PBI	0518.0		130.0	4	2		
	2950	GORK	22 GRF	0533.0E	0956.2	373.0D	15			
	1000	TYKW	5 S	0604.5	0604.9	1.0	3.5	.7		
	9100	GORK	22 GRF	0645.5	0648.1	11.5	6.5			
	9100	GORK	22 GRF	0739.3	0739.6	17.0	8			
	1470	POTS	4 S/F	0743.0	0744.7	2.0	21			
	650	GORK	22 GRF	0743.3	0752.3	167.0	4			
	950	GORK	4 S/F	0743.6	0744.5	1.5	28			
	930	BORD	46 C	0743.6	0744.6	1.4	43	7		
	1000	TYKW	45 C	0743.7	0744.7	1.5	52	12		
	1415	LEAR	8 S	0743.8	0744.6	.8	32			
	15400	LEAR	8 S	0744.1	0744.3	.9	15			
	1470	POTS	3 S	0752.0	0752.4	1.0	7.8			
	650	GORK	40 F	0811.2	0813.7	3.2	11			
	810	KRAK	42 SER	0812.7	0814.3	2.7	72			
	606	LEAR	8 S	0813.5	0813.8	.3	22			
	410	LEAR	8 S	0813.6	0813.8	.2	35			
	930	BORD	41 F	0813.6	0814.2	1.6	43	2		
	9100	GORK	20 GRF	0828.8	0830.2	19.0	5	2		
	650	GORK	22 GRF	0844.5	0853.6	12.7	4			
	810	KRAK	42 SER	0851.5	0853.0	2.0	110			
	930	BORD	41 F	0851.7	0852.8	1.1	16	2		
	100	GORK		0909.0E	0913.2		200			
	100	GORK	40 F	0909.0E	0909.2	114.0D	190			
	100	GORK		0909.0E	0916.4		200			
	9100	GORK	20 GRF	0933.0	0935.2	12.7	16			
	9500	POTS	20 GRF	0933.0	0935	7.0	8.5			
	3000	POTS	20 GRF	0943.0	0952.4	52.0	23			
	9100	GORK	22 GRF	0951.9	1033.8	113.0E	11			
	9500	POTS	29 PBI	1245.5	1246.2	20.0	14			
	9400	HUAN	S	1246.5	1246.8	1.7	18.6	10.5		0
	2800	OTTA	21 GRF	1355.0		60.0	4.2			
	29	UPIC	46 C	1404.2	1405.4	4.7				
	1470	POTS	40 F	1404.5	1405.2	3.5	3.9			
	2695	ATHN	4 SF	1424.3	1427.1	9.8D	13			
	3200	BERN	3 S	1424.5	1426.7	30.0	.0			ONLY PAPER REC
	8400	BERN	3 S	1424.5	1426.7	26.0	16.0			ONLY PAPER REC
	1415	ATHN	4 SF	1424.5	1427.8	7.1D	08			
	5200	BERN	3 S	1424.5	1426.7	30.0	36.0			ONLY PAPER REC
	2695	SGMR	4 SF	1424.6	1427.1	4.2D	11			
	4995	ATHN	4 SF	1424.8	1426.8	11.0D	29			
	2800	OTTA	1 S	1425.0	1427	4.0	9.4	3.4		
	8800	SGMR	4 SF	1425.0	1427.0	3.1	23			
	3000	POTS	3 S	1425.0	1427.0	3.0	13			
	9500	POTS	3 S	1425.0	1426.9	3.0	17			

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DAY OF MONTH	FREQUENCY	STATION	TYPE		STARTING TIME UT	TIME OF MAXIMUM UT	DURATION MINUTES	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1} PEAK	FLUX DENSITY MEAN	INT	POLARIZATION OR REMARKS
14	4995	SGMR	4	SF	1425.1	1427.0	3.5D	24			
	8800	ATHN	4	SF	1425.3	1427.1	7.5	38			
	9400	HUAN		S	1426.0	1426.8	1.7	20.5	8.6		L
	2800	OTTA	20	GRF	1520.0	1610	80.0	5.0	3.7		
	2800	OTTA	22	GRF	1846.0	1848	65.0	4.2			
	9400	TYKW	5	S	2335.0	2335.6	1.5	3	1		
	9400	TYKW	5	S	2338.3	2338.8	4.0	14	3		
	8800	PALE	8	S	2338.5	2338.6	.3	30			
	8800	LEAR	8	S	2338.6	2338.6	.5	24			
	9400	TYKW	45	C	2346.5	2348.5	6.5	159	35		
	8800	PALE	4	SF	2346.8	2348.3	10.0	210			
	8800	LEAR	4	SF	2347.0	2348.3	6.1	170			
	8800	MANI	4	SF	2347.1	2348.8	8.4	200			
	4995	MANI	4	SF	2347.1	2348.8	8.9D	74			
	17000	NOBE	1	S	2347.3	2348.4	1.9	42			L
	15400	LEAR	4	SF	2347.3	2348.3	6.7	67			
	4995	LEAR	8	S	2347.5	2348.3	1.8	43			
	3750	TYKW	5	S	2347.5	2348.4	2.5	10	4.5		
	15400	PALE	4	SF	2347.6	2348.3	3.0	67			
	4995	PALE	8	S	2347.6	2348.3	1.5	42			
	17000	NOBE	29	PBI	2349.1	2349.2	8.0	12			0
	3750	TYKW	29	PBI	2350.0		25.0	3	1		
	9400	TYKW	30	PBI	2353.0		25.0	12	3		
15	410	LEAR	43	NS	0347.0	0354.8	396.0D	39			
	100	GORK	44	NS	0455.0E		125.0D		5		
	260	ONDR	44	NS	0754.0E		432.0D	30			
	245	PALE	43	NS	1820.3	1820.6	.7	33			
	245	LEAR	43	NS	2308.0	2308.6	674.0D	64			
	200	GORK	44	NS	3455.0E		386.0D		5		
	9400	TYKW	5	S	0003.0	0003.3	1.0D	7	3	D	
	9400	TYKW	5	S	0011.2	0011.5	1.0	8	2		
	3750	TYKW	21	GRF	0028.0	0043	30.0	5	2.5		
	9400	TYKW	20	GRF	0033.0	0043	30.0	5	2		RAIN
	15400	PALE	8	S	0052.6	0052.8	.2	16			
	15400	PALE	8	S	0054.8	0055.5	.2	18			
	3750	TYKW	28	PRE	0110.0	0124	14.0	2	1		
	9400	TYKW	21	GRF	0120.0	0130	90.0	6	3	U	RAIN
	2000	TYKW	20	GRF	0120.0	0129	90.0	6	2		
	3750	TYKW	5	S	0124.0	0129	20.0	10	5		
	3750	TYKW	30	PBI	0144.0		65.0	4	2		
	3750	TYKW	20	GRF	0146.0	0155.5	45.0	8	2.5		
	4995	LEAR	4	SF	0148.1	0154.0	10.4	20			
	9400	TYKW	20	GRF	0150.0	0205	50.0	4	2		
	4995	PALE	8	S	0152.1	0154.0	2.0	20			
	15400	PALE	8	S	0154.0	0155.1	1.1	23			
	15400	PALE	47	GB	0157.1	0159.1	12.4	36			
	2000	TYKW	21	GRF	0310.0	0457	270.0	10	4.5		
	3750	TYKW	21	GRF	0310.0	0457	270.0	20	8		
	3750	TYKW	5	S	0315.0	0324.6	20.0	5	2		
	2000	TYKW	5	S	0318.0	0325	17.0	2	1		
	9400	TYKW	20	GRF	0320.0	0500	240.0	20	9		RAIN
	2000	TYKW	5	S	0351.0	0352	20.0	1.5	.8		
	1000	TYKW	5	S	0355.0	0355.5	1.0	4	1		
	2000	TYKW	5	S	0403.0	0403.5	1.0	2	.5		
	8800	PALE	8	S	0405.1	0405.3	.2	20			
	1000	TYKW	45	C	0416.0	0417.8	6.0	3	1		
	1000	TYKW	45	C	0425.0	0428.8	12.0	13	3		
	3750	TYKW	5	S	0427.0	0428.8	10.0	8	2		
	2000	TYKW	5	S	0427.0	0428.8	11.0	9	3		
	1415	LEAR	4	SF	0427.3	0428.8	4.5	10			
	410	LEAR	8	S	0427.6	0427.8	1.5	18			
	606	LEAR	4	SF	0427.8	0428.1	5.0	28			
	2695	LEAR	4	SF	0428.1	0428.8	3.5	13			
	2000	TYKW	45	C	0438.0	0440.1	4.0	2.5	1		
	1000	TYKW	45	C	0438.0	0440.1	4.0	5	1.5		
	3750	TYKW	45	C	0438.0	0440.1	4.0	3	1		
	8800	LEAR	4	SF	0442.1	0452.6	12.9	11			
	4995	LEAR	4	SF	0442.1	0453.6	12.9	24			
	3750	TYKW	5	S	0443.5	0444.0	3.0	2	.7		
	1000	TYKW	45	C	0447.0	0450.2	4.0	4	.7		
	3750	TYKW	5	S	0452.0	0453.7	4.0	11	3		
	1000	TYKW	45	C	0456.0	0457.7	3.0	14	3		
	1000	TYKW	45	C	0531.0	0532.4	6.0	6	1.5		
	2000	TYKW	45	C	0533.9	0534.7	1.1	4	1		
	9500	POTS	1	S	0709.5	0709.7	1.5	8.4			
	3750	TYKW	5	S	0718.0	0719.8	12.0	6	1.5		
	2000	TYKW	5	S	0718.0	0720	12.0	3.5	1		
	3100	CRIM	1	S	0718.6	0719.5	2.0	6	2		
	2950	GORK	20	GRF	0718.8	0719.8	10.4	55	2.7		
	5200	BERN	22	GRF	0900.0	0915.8	82.0	30.0			ONLY PAPER REC
	3200	BERN	22	GRF	0900.0	0915.8	82.0	.0			ONLY PAPER REC
	2950	GORK	20	GRF	0905.7	0916.7	105.0	11	5		
	9500	POTS	20	GRF	0910.0	1003	165.0	23			
	9100	GORK	20	GRF	0911.2	0955.7	104.0	20			

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DAY OF MONTH	FREQUENCY	STATION	TYPE	STARTING TIME	TIME OF MAXIMUM	DURATION	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1}		INT	POLARIZATION OR REMARKS
				UT	UT	MINUTES	PEAK	MEAN		
15	2695	LEAR	47 GB	0912.3	0917.1	5.0	19			
	8800	LEAR	47 GB	0912.3	0915.5	5.0	16			
	4995	LEAR	47 GB	0912.3	0915.5	5.0	22			
	100	GORK		0914.5	0919.3		222000			
	100	GORK		0914.5	0915.6		130 D			
	100	GORK		0914.5	0918.8		2100 D			
	100	GORK	41 F	0914.5	0914.8	8.0	130 D			
	200	GORK	4 S/F	0918.0	0918.3	1.8	50			
	260	ONDR	46 C	0954.3	0954.3	3.5	138	17		
	1415	LEAR	8 S	0954.3	0955.3	2.0	10			
	2695	LEAR	8 S	0954.3	0955.3	2.0	21			
	536	ONDR	45 C	0954.7	0957.2	3.5	59	5		
	950	GORK	2 S/F	0954.8	0955.3	4.0	4			
	234	POTS	4 S/F	0954.8	0955.1	.8	525	35		
	410	LEAR	47 GB	0954.8	0956.8	3.0	64			
	245	LEAR	8 S	0954.8	0955.1	.7	290			
	650	GORK	4 S/F	0954.9	0956.9	5.1	49			
	200	GORK	41 F	0955.0	0955.4	3.3	50 D			
	200	GORK		0955.0	0957.7		50			
	1470	POTS	40 F	0955.0U	0955 U	4.5U	5.2			
	3000	POTS	40 F	0955.0	0955.3	4.0	10			
	606	LEAR	47 GB	0955.1	0956.8	2.7	64			
	808	ONDR	8 S	0956.0	0956	.2	35			
	810	KRAK	8 S	0956.0	0956.0	.1	700			
	228	HARS	8 S	1055.1	1055.2	1.1				
	810	KRAK	8 S	1206.8	1206.8	.2	13			
	9500	POTS	1 S	1320.0	1320.8	1.5	6.8			
	1470	POTS	20 GRF	1336.0	1338.4	19.0	2.7			
	3000	POTS	20 GRF	1340.0	1345	11.0	6.3			
	9500	POTS	20 GRF	1340.0	1345.4	11.0	3.4			
	2800	OTTA	22 GRF	1340.0		95.0	3.4			
	2695	SGMR	4 SF	1340.8	1344.6	8.0	05			
	8800	ATHN	4 SF	1401.1	1413.3	47.2	95			
	4995	ATHN	4 SF	1404.3	1413.3	36.7D	41			
	5200	BERN	22 GRF	1407.0	1413.0	30.0	39.0			ONLY PAPER REC
	2695	SGMR	4 SF	1407.0	1415.5	11.0	04			
	3200	BERN	22 GRF	1407.0	1413.0	30.0	.0			ONLY PAPER REC
	8400	BERN	22 GRF	1407.0	1413.0	30.0	76.0			ONLY PAPER REC
	4995	SGMR	4 SF	1407.1	1413.3	9.9D	38			
	8800	SGMR	4 SF	1407.3	1413.1	9.7D	91			
	9500	POTS	29 PBI	1407.5	1413.0	28.0D	54			
	9400	HUAN	S	1407.8	1415.2	41.2	32.0	12.3		L
	15400	SGMR	4 SF	1408.3	1413.3	9.7D	22			
	2695	ATHN	4 SF	1408.3	1413.3	12.3D	05			
	1415	ATHN	4 SF	1409.8	1412.8	10.2D	07			
	10715	DWIN	1 S	1412.0	1413	3.0	40	20		
	9400	HUAN	S	1412.0	1413.2	2.7	55.1	33.8		L
	2800	OTTA	23 GRF	1520.0	1550	275.0	7.6			
	2800	OTTA	1 S	1627.0	1631	6.0	2.2	1.1		
	606	SGMR	4 SF	1702.0	1702.6	4.0	420			
	930	BORD	41 F	1702.6	1702.6	3.0	57	2		
	606	PALE	8 S	1702.6	1702.6	.5	330			
	245	SGMR	8 S	1820.3	1820.6	1.0	40			
	606	PALE	8 S	1827.1	1828.1	1.4	200			
	606	SGMR	8 S	1827.8	1828.1	1.2	210			
	410	SGMR	8 S	1828.0	1828.3	.8D	63			
	410	PALE	8 S	1828.1	1828.3	.5	50			
	2800	OTTA	1 S	1828.2	1828.5	1.0	3.4	1.7		
	245	SGMR	4 SF	1854.0	1859.0	8.6	200			
	9400	HUAN	8 S	2113.1	2113.4	.7	62.2	23.8		L
	9400	HUAN	29 PBI	2113.8	2113.8	27.0	8.9	4.7		L
	2800	OTTA	1 S	2138.8	2139.1	2.0	4.2	1.6		
	1000	TYKW	8 S	2151.4	2151.5	.4	19	5		
	1000	TYKW	5 S	2254.8	2255.2	2.0	3	1		
	9400	TYKW	45 C	2259.0	2300.0	7.0	9	1.5		
	9400	TYKW	5 S	2325.0	2326.8	4.0	2	1		
	3750	TYKW	5 S	2326.0	2326.8	2.0	2	.5		
	9400	TYKW	45 C	2344.0	2349.3	18.0	7	3		
16	410	LEAR	43 NS	0425.8	0426.0	249.2	27			
	200	HIRA	43 NS	0600.0	0734	160.0D	10	5		WR
	200	GORK	44 NS	0618.0E		222.0D		5		
	100	GORK	43 NS	0627.0		153.0D		10		
	127	TORN	44 NS	0700.0E	1137.7	500.0D	30	3		V0
	260	ONDR	44 NS	0753.0E		435.0D	47			
	8800	PALE	4 SF	0148.8	0150.1	2.8	37			
	8800	LEAR	8 S	0149.8	0150.1	2.0	30			
	3750	TYKW	21 GRF	0152.0E	0155.6	60.0D	3	1.5D		
	9400	TYKW	20 GRF	0153.0E	0155.6	70.0D	18	8 D		
	606	LEAR	8 S	0157.8	0158.0	.5	36			
	410	LEAR	8 S	0157.8	0158.0	.5	52			
	410	PALE	8 S	0204.1	0204.3	.2	72			
	410	LEAR	8 S	0204.1	0204.6	.7	18			
	245	LEAR	8 S	0204.5	0204.6	.3	23			
	410	LEAR	8 S	0210.5	0211.6	1.1	220			

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DAY OF MONTH	FREQUENCY	STATION	TYPE	STARTING TIME UT	TIME OF MAXIMUM UT	DURATION MINUTES	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1} PEAK	FLUX DENSITY MEAN	INT	POLARIZATION OR REMARKS
16	2800	TYKW	45 C	0211.0	0211.9	2.5	6	2		
	3750	TYKW	5 S	0211.0	0212.0	2.0	1.5	.5		
	1000	TYKW	45 C	0211.0	0212.1	7.0	4	1		
	606	LEAR	8 S	0211.3	0211.6	.5	27			
	245	PALE	8 S	0216.1	0216.3	.2	150			
	2800	TYKW	32 ABS	0350.0	0500	106.0	-2	-1		
	3750	TYKW	32 ABS	0410.0	0525	85.0	-4	-2		
	9400	TYKW	32 ABS	0410.0	0500	85.0	-4	-2		
	5730	IRKU	2 S	0526.8	0537.2	15.8	435			L
	4995	MANI	4 SF	0531.8	0537.0	16.5D	220			
	8800	MANI	47 GB	0535.0	0537.0	9.0	500			
	2950	GORK	3 S	0535.0	0537.3	3.9	36	18		
	9100	GORK	3 S	0535.0	0537.2	5.4	230			
	9400	TYKW	5 S	0535.0	0537.0	6.0	470	100		
	3750	TYKW	5 S	0535.0	0537.3	10.0	91	25		
	8800	ATHN	47 GB	0535.3	0536.8	21.2	540			
	2695	ATHN	4 SF	0535.3	0536.8	21.2D	70			
	4995	ATHN	4 SF	0535.3	0536.8	21.2D	220			
	4995	LEAR	4 SF	0535.5	0537.1	7.3	230			
	3100	CRIM	3 S	0535.5	0537.5	7.0	51	17		
	8800	LEAR	47 GB	0535.6	0537.0	7.2	550			
	2695	MANI	4 SF	0535.8	0537.1	5.2D	32			
	35000	NAGO	5 S	0536.0	0537	3.0	21			
	17000	NOBE	3 S	0536.0	0537.1	6.2	203			L
	2800	TYKW	5 S	0536.0	0537.7	6.0	7	2.5		
	15400	LEAR	4 SF	0536.1	0537.1	5.2	270			
	2695	LEAR	4 SF	0536.3	0537.3	3.5	32			
	2950	GORK	20 GRF	0538.0	0606.0	28.5	3.0	1.5		
	2950	GORK	29 PBI	0538.8	0539.0	11.8	12			
	9100	GORK	29 PBI	0540.3	0540.4	46.0	28			
	5730	IRKU	29 PBI	0541.0		42.0	60			L
	9400	TYKW	30 PBI	0541.0		60.0	10	4		
	3750	TYKW	30 PBI	0545.0		75.0	4	1.5		
	3750	TYKW	20 GRF	0555.0	0605	45.0	6	2.5		
	2800	TYKW	20 GRF	0555.0	0605 U	65.0	3 U	1.5D		
	9400	TYKW	45 C	0607.0E	0609.3	10.0D	7	1.5D		
	606	LEAR	8 S	0613.6	0613.8	1.0	41			
	3100	CRIM	20 GRF	0807.0	0844.0	218.0	13	4		
	2950	GORK	20 GRF	0812.0	0844.3	228.0	10.5	5		
	6100	KISV	1 S	0828.0	0828.5	1.0	4			
	3000	POTS	22 GRF	0945.0	0956.2	38.0	8.3			
	1470	POTS	22 GRF	0945.0	0952.7	35.0	5.5			
	2800	OTTA	1 S	1210.0	1216.5	10.0	4.4	2.1		
	2950	GORK	1 S	1214.0	1216.2	4.5	3.0	1.5		
	8800	SGMR	4 SF	1249.1	1254.3	12.7D	37			
	4995	SGMR	4 SF	1249.1	1254.8	12.9D	35			
	4995	ATHN	4 SF	1249.3	1254.6	15.0D	44			
	9400	HUAN	S	1249.5	1258.7	50.1	26.0	7.9		L
	8800	ATHN	4 SF	1249.6	1254.6	16.0	35			
	15400	SGMR	4 SF	1249.8	1256.6	11.2	18			
	2800	OTTA	23 GRF	1250.0		200.0	7.0			
	2695	SGMR	4 SF	1250.1	1253.8	12.7D	08			
	2800	OTTA	1 S	1252.5	1255	9.0	8.6	5.7		
	9500	POTS	4 S/F	1253.0	1254.5	7.0	15			
	3000	POTS	4 S/F	1253.0	1254.5	7.0	11			
	9500	POTS		1253.0	1257.0		15			
	2695	ATHN	4 SF	1253.1	1254.6	11.7D	11			
	9400	HUAN	C	1253.3	1254.4	4.5	31.1	14.1		L
	2800	OTTA	1 S	1353.0	1354.5	3.0	2.2	1.0		
	9400	TYKW	5 S	2149.0	2149.9	2.0	14	4		
	8800	PALE	8 S	2149.6	2149.8	1.2	27			
	4995	PALE	8 S	2149.6	2150.0	1.2	15			
	9400	TYKW	30 PBI	2151.0		35.0	5	2.5		
	9400	TYKW	45 C	2156.0	2157	3.0	2	1		
	2800	OTTA	3 S	2156.0	2201	9.0	10.8	2.8		
	2000	TYKW	5 S	2159.0	2200.9	5.0	4	1.5		
	3750	TYKW	5 S	2159.0	2200.9	5.0	10	3		
	200	HIRA	46 C	2159.6	2200.5	2.6	420	80		WR
	9400	TYKW	5 S	2200.0	2200.9	2.0	2	.7		
	245	LEAR	8 S	2252.1	2253.0	1.0	73			
	3750	TYKW	45 C	2302.0	2315.4	18.0	7	3.5		
	2000	TYKW	20 GRF	2305.0	2335	80.0	2	1		
	9400	TYKW	28 PRE	2306.0	2313.5	9.0	9	4		
	9400	TYKW	5 S	2315.0	2315.4	2.0	31	8		
	8800	PALE	8 S	2315.0	2315.3	.6	35			
	4995	PALE	8 S	2315.3	2315.3	.2	15			
	9400	TYKW	29 PBI	2317.0		75.0	10	4		
	3750	TYKW	29 PBI	2320.0		80.0	6	3		
	410	LEAR	47 GB	2338.5	2339.5	1.1	560			
	245	LEAR	47 GB	2338.5	2339.5	1.1	2700			
17	245	LEAR	43 NS	2243.0	0510.3	698.0D	220			
	245	LEAR	8 S	0112.1	0112.3	.4	30			
	9400	TYKW	28 PRE	0220.0	0255	35.0	6	2.5		
	3750	TYKW	28 PRE	0220.0	0255	35.0	4	2		

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17	3750	TYKW	5 S	0229.0	0229.3	1.0	1	.3		
	1000	TYKW	5 S	0229.0	0229.4	1.0	3	.5		
	2000	TYKW	5 S	0229.0	0229.3	1.0	1	.3		
	410	LEAR	8 S	0231.1	0231.3	.7	18			
	2000	TYKW	45 C	0250.0	0308.0U	30.0	4.5U	2 D		
	2000	TYKW		0250.0	0258.6		3.5			
	3750	TYKW	45 C	0255.0	0258.6	25.0	14	11		
	9400	TYKW	45 C	0255.0	0258.5	25.0	14	12		
	9400	TYKW		0255.0	0309		14			
	3750	TYKW		0255.0	0305		13			
	8800	LEAR	4 SF	0257.1	0258.1	4.7	16			
	2000	TYKW	29 PBI	0320.0		70.0	3	1		
	3750	TYKW	30 PBI	0320.0		100.0	10	5		
	3750	TYKW	5 S	0320.0	0320.7	3.0	1.5	.5		
	9400	TYKW	5 S	0320.0	0320.7	4.0	19	5		
	9400	TYKW	30 PBI	0320.0		100.0	10	5		
	4995	LEAR	8 S	0320.3	0321.0	1.5	08			
	8800	LEAR	8 S	0320.5	0320.6	1.1	21			
	3750	TYKW	5 S	0346.5	0348.0	10.0	4	1.5		
	9400	TYKW	5 S	0420.0	0420.8	2.0	12	6		
	3750	TYKW	5 S	0420.0	0421.6	3.0	3	2		
	8800	LEAR	8 S	0420.6	0420.8	.2	15			
	4995	LEAR	8 S	0420.6	0420.8	.2	11			
	9400	TYKW	29 PBI	0422.0		15.0	3	1		
	3750	TYKW	29 PBI	0423.0		10.0	1	.5		
	3750	TYKW	20 GRF	0610.0	0709.5	100.0	6	2		
	2000	TYKW	20 GRF	0630.0	0710	70.0	2	1		
	9400	TYKW	20 GRF	0707.0	0709.5	35.0	4	2		
	6100	KISV	1 S	0756.0	0758	4.0	9			
	9100	GORK	1 S	0756.1	0757.9	5.7	7	3.5		
	3100	CRIM	26 FAL	0832.0	1212.0		8			
	127	TORN	42 SER	1147.0	1153.0	10.0	30			
	930	BORD	46 C	1454.7	1459.7	11.3	577	13		
	606	SGMR	47 GB	1457.6	1500.0	10.9	980			
	2800	OTTA	20 GRF	1900.0	2003	120.0	3.6	1.8		
18	260	ONDR	43 NS	1023.0		251.0D	50			
	245	LEAR	44 NS	2243.0E	2256.5	22.1D	23			
	3750	TYKW	21 GRF	0030.0	0100	60.0	2	1		
	9400	TYKW	5 S	0035.0	0036.4	3.0	7	2.5		
	1000	TYKW	5 S	0036.0	0036.6	2.0	7	2.5		
	2000	TYKW	5 S	0036.0	0036.5	1.5	7	2.5		
	3750	TYKW	5 S	0036.0	0036.5	2.0	5	1.5		
	2695	PENT	1 S	0036.0	0036.5	1.0	5.4	1.8		
	606	LEAR	8 S	0036.1	0036.3	.7	17			
	4995	LEAR	8 S	0036.1	0036.5	.7	06			
	1415	LEAR	8 S	0036.3	0036.5	.5	11			
	410	LEAR	8 S	0036.3	0036.5	.5	49			
	2695	LEAR	8 S	0036.3	0036.6	.5	06			
	8800	LEAR	8 S	0036.3	0036.5	.5	16			
	9400	TYKW	29 PBI	0038.0		20.0	3	1.5		
	1000	TYKW	5 S	0154.0	0154.5	3.0	7	1		
	3750	TYKW	5 S	0200.0	0201.2	3.0	2	.5		
	9400	TYKW	5 S	0200.0	0201.0	3.0	4	2		
	2000	TYKW	5 S	0201.0	0201.4	1.0	2	.5		
	1000	TYKW	5 S	0201.0	0201.3	1.0	1.5	.5		
	3750	TYKW	45 C	0205.0	0205.7	2.0	3	1.5		
	1000	TYKW	5 S	0444.0	0444.3	1.0	1	.3		
	2000	TYKW	5 S	0444.0	0444.2	1.0	3	1		
	9400	TYKW	5 S	0444.0	0444.2	1.5	3	1		
	3750	TYKW	5 S	0444.0	0444.2	2.0	6	2		
	9400	TYKW	21 GRF	0450.0	0520	45.0	5	2.5		
	3750	TYKW	21 GRF	0500.0	0506.3	35.0	4	1.2		
	2000	TYKW	5 S	0504.0	0506.5	20.0	3.5	1		
	9400	TYKW	5 S	0515.0	0516.3	3.0	8	2		
	3750	TYKW	45 C	0515.0	0516.5	2.0	14	4		
	6100	KISV	4 S/F	0515.5	0516.2	1.0	12			
	8800	LEAR	8 S	0515.6	0516.3	1.4	08			
	2695	LEAR	8 S	0515.8	0516.3	1.2	13			
	606	LEAR	8 S	0515.8	0516.0	.7	36			
	1415	LEAR	8 S	0515.8	0516.3	1.2	09			
	4995	LEAR	8 S	0515.8	0516.3	.7	25			
	2000	TYKW	45 C	0515.8	0516.4	1.2	8	3		
	1000	TYKW	45 C	0515.8	0516.4	1.2	4	2		
	3750	TYKW	29 PBI	0517.0		11.0	2	1		
	1000	TYKW	5 S	0523.8	0524.2	1.0	7	2.5		
	3750	TYKW	20 GRF	0540.0	0615	90.0	3	1.5		
	3100	CRIM	26 FAL	0550.0	0715.0		14			
	650	GORK	2 S/F	0820.1	0821.5	3.5	4			
	3100	CRIM	25 R	0821.0	0912.0		9	3		
	2950	GORK	21 GRF	0834.0	0912.0	233.0	6.3	3.0		
	6100	KISV	4 S/F	0937.5	0939	2.0	6			
	3100	CRIM	1 S	0938.0	0939.0	2.0	3	1		
	2950	GORK	1 S	0938.0	0939.0	1.2	29	1.4		
	9100	GORK	1 S	0938.0	0938.9	2.7	5	2.5		

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18	650	GORK	21 GRF	0946.7	0952.3	28.0D	3			
	10715	DWIN	4 S/F	0948.0	0949	3.0	170	100		
	5200	BERN	3 S	0948.0	0948.8	20.0	170.0			ONLY PAPER REC
	2650	DWIN	2 S/F	0948.0	0949	3.0	40	20		
	3200	BERN	3 S	0948.0	0948.8	20.0	.0			ONLY PAPER REC
	8400	BERN	3 S	0948.3	0948.6	15.0	265.0			
	11800	BERN	3 S	0948.3	0948.8	12.0	160.0			
	19600	BERN	3 S	0948.3	0948.9	3.0	71.0			
	6100	KISV	4 S/F	0948.3	0949.3	3.0	140			
	2950	GORK		0948.5	0950.0		22			
	9100	GORK	3 S	0948.5	0949.3	1.9	200			
	3100	CRIM	3 S	0948.5	0949.3	5.0	44	15		
	2950	GORK	45 C	0948.5	0949.2	3.0	42			
	15000	KISV	8 S	0948.5	0949	2.0	113			
	3000	POTS	4 S/F	0948.5	0949.1	3.5	44			
	1470	POTS	4 S/F	0948.5	0949.3	4.5	30			
	4995	LEAR	8 S	0948.6	0949.1	1.9	150			
	810	KRAK	2 S/F	0948.7	0949.7	2.0	23	7		
	536	ONDR	2 S/F	0948.7	0949.3	2.0	21	4		
	950	GORK	4 S/F	0948.7	0949.4	2.3	19			
	650	GORK		0948.8	0949.9		38			
	650	GORK	46 C	0948.8	0949.2	3.5	18.5			
	410	LEAR	47 GB	0948.8	0949.0	.3	540			
	1415	LEAR	8 S	0948.8	0949.1	1.3	33			
	4995	ATHN	4 SF	0948.8	0949.5	10.8D	139			
	930	BORD	45 C	0948.8	0950.1	3.2	33	5		
	2695	LEAR	8 S	0948.8	0949.1	1.3	53			
	8800	ATHN	4 SF	0948.8	0949.6	14.3	260			
	2695	ATHN	8 S	0948.8						
	8800	LEAR	8 S	0948.8	0949.3	1.7	230			
	606	LEAR	8 S	0949.0	0950.0	1.8	32			
	15400	LEAR	8 S	0949.0	0949.3	.5	73			
	430	KRAK	8 S	0949.0	0949.3	.7	340			
	9500	POTS	29 PBI	0949.0	0949.3	21.0	160			
	1415	ATHN	8 S	0949.1	0949.6	2.0	24			
	9100	GORK	29 PBI	0950.3	0950.4	17.1	30			
	950	GORK	29 PBI	0950.9	0951.0	9.5	45			
	930	BORD	8 S	1310.2	1310.2	.1	20	1		
	4995	ATHN	8 S	1515.6	1516.1	1.7D	25			
	8800	ATHN	4 SF	1515.6	1516.1	6.4	08			
	930	BORD	41 F	1558.5	1558.8	.5	48	2		
	2800	OTTA	21 GRF	1825.0	2125	300.0	7.0	3.5		
	9400	HUAN	S	1858.9	1900.2	3.8	83.0	31.4		R
	2800	OTTA	46F C	1859.0	1900.5	7.0	35.0	10.2		
	8800	PALE	4 SF	1859.1	1900.3	3.5	100			
	2695	PALE	8 S	1859.8	1900.3	1.0	38			
	4995	PALE	4 S/F	1859.8	1900.3	2.7	39			
	606	PALE	8 S	1859.8	1900.1	.8	250			
	15400	PALE	8 S	1900.0	1900.3	.5	41			
	1415	PALE	8 S	1900.1	1900.6	.5	27			
	9400	HUAN	29 PBI	1902.7	1902.7	14.4	14.6	5.8		R
	2800	OTTA	22 GRF	2028.0	2033.5	17.0	4.2	2.1		
19	208	VORO	44 NS	0150.0E		130.0D		9.5		
	200	GORK	44 NS	0345.0E		315.0D		10		
	200	HIRA	43 NS	0430.0	0712	230.0D	27	3		WR
	204	IZMI	44 NS	0600.0E		360.0D	60			
	127	TORN	44 NS	0700.0E	1157.0	500.0D	140	9		V1
	260	ONDR	44 NS	0805.0E		419.0D	88	11		
	200	HIRA	44 NS	2042.0E	0711	725.0D	190	40		ML
	100	HIRA	44 NS	2042.0E	2233	220.0D	100	20		0
	208	VORO	44 NS	2300.0E		360.0D		37		
	3750	TYKW	5 S	0112.0	0112.3	4.0	8	2		
	9400	TYKW	5 S	0112.0	0112.3	2.0	4	1		
	2000	TYKW	5 S	0112.0	0112.4	2.0	2	1		
	2695	PENT	1 S	0112.0	0112.3	1.5	5.4	2.5		
	930	BORD	41 F	0747.3	0747.7	.6	36	3		
	930	BORD	8 S	0752.7	0752.8	.2	22	2		
	930	BORD	41 F	0837.8	0837.8	.7	46	2		
	810	KRAK	42 SER	0838.0	0900.5	70.0	180			
	536	ONDR	42 SER	0857.0	0858.7	23.0	27			
	430	KRAK	42 SER	0858.5	0858.5	50.0	50			
	930	BORD	41 F	0859.7	0900.3	1.9	71	2		
	1470	POTS	8 S	0900.4	0900.5	.3	9.2			
	650	GORK	22 GRF	0919.6	0919.9	14.6	8			
	2950	GORK	1 S	0919.7	0920.0	1.5	5.8	2.9		
	3000	POTS	1 S	0919.7	0920.0	2.3	6			
	930	BORD	41 F	0919.7	0920.0	.3	17	3		
	9100	GORK	1 S	0919.8	0920.0	1.2	5	2		
	1470	POTS	3 S	0919.9	0920.0	1.1	6.9			
	6100	KISV	1 S	1032.0	1033	2.0	4			
	2950	GORK	1 S	1032.7	1033.0	1.3	2.9	1.4		
	9100	GORK	1 S	1032.7	1033.0	1.0	5.3	2.5		
	430	KRAK	2 S/F	1227.7	1228.3	.7	27			
	536	ONDR	8 S	1231.2	1231.2	.2	32			

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19	2800	OTTA	1	S	1239.0	1239.5	1.5	2.0	1.0		
	3200	BERN	1	S	1330.6	1331.2	9.0	.0			ONLY PAPER REC
	5200	BERN	1	S	1330.6	1331.2	9.0	13.0			ONLY PAPER REC
	2800	OTTA	1	S	1331.0	1331.3	2.0	4.0	1.4		
	9500	POTS	1	S	1331.0	1331.5	1.2	5			
	3000	POTS	1	S	1331.0	1331.4	1.5	4			
	1470	POTS	1	S	1331.4	1331.5	.3	3			
	930	BORD	41	F	1624.6	1624.8	.5	270	3		
	2800	OTTA	1	S	1624.7	1625	1.0	2.0	1.0		
	2800	OTTA	21	GRF	1850.0	1905	70.0	2.8	1.4		
	2800	OTTA	1	S	1852.0	1854	3.0	2.0	1.0		
	2800	OTTA	240	R	2005.0	2050	45.0	7.8	3.0		
	1000	TYKW	45	C	2311.0	2312.6	6.0	8	2.5		
	2000	TYKW	45	C	2311.0	2312.1	6.0	15	4.5		
	9400	TYKW	45	C	2311.0	2313	10.0	6	2.5		
	3750	TYKW	45	C	2311.0	2312.5	10.0	13	3		
	2695	PENT	4	S/F	2311.3	2312	5.0	11.0	3.8		
	3750	TYKW	21	GRF	2330.0	0010	70.0	2	1		
	3750	TYKW	5	S	2342.0	2344	8.0	3	1		
	9400	TYKW	5	S	2342.0	2344.5	10.0	4	1.5		
	9400	TYKW	20	GRF	2355.0	0010	55.0	3	1.5		
20	200	GORK	44	NS	0354.0E		471.0D		30		
	100	GORK	44	NS	0457.0E		468.0D		5		
	29	UPIC	43	NS	0537.8	0750.7U	553.0U				
	204	IZMI	44	NS	0600.0E		360.0D	65			
	127	TORN	44	NS	0700.0E	1100.1	500.0D	730	18		V2
	260	ONDR	44	NS	0750.0E		437.0D	179	16		
	536	ONDR	43	NS	0901.0	1346.6	352.0D	39			
	430	KRAK	44	NS	1106.0E	1110.5	180.0D	130	6		
	200	HIRA	44	NS	2040.0E	0129	725.0D	90	30		WL
	245	LEAR	43	NS	2249.0	0234.6	689.0D	260			
	208	VORO	44	NS	2300.0E		360.0D		32		
	9400	TYKW	21	GRF	0320.0	0335	50.0	6	2		
	3750	TYKW	21	GRF	0320.0	0335	80.0	3	1		
	3750	TYKW	5	S	0325.0	0327.5	5.0	3	1		
	9400	TYKW	5	S	0327.0	0327.4	2.0	2	1		
	3750	TYKW	45	C	0335.0	0336.4	5.0	6	1.5		
	2000	TYKW	45	C	0335.0	0336.3	2.5	2	1		
	1000	TYKW	5	S	0336.0	0336.3	1.5	1	.3		
	9400	TYKW	5	S	0336.0	0336.3	3.0	4	1		
	9400	TYKW	5	S	0535.0	0538	15.0	4	1.5		
	1000	TYKW	5	S	0537.0	0537.5	1.5	3	1		
	3750	TYKW	45	C	0537.0	0537.7	3.0	7	2		
	2000	TYKW	5	S	0537.0	0537.7	3.0	2	.5		
	100	GORK	8	S	0537.2	0538.0	1.0	920			
	200	GORK	8	S	0537.5	0537.8	.8	800 D			
	9100	GORK	2	S/F	0539.3	0542.4	3.5	8			
	2950	GORK	1	S	0540.0	0540.6	2.1	4.6	2.3		
	204	IZMI	7	C	0726.0	0726.3	.5	1000	500		
	234	POTS	41	F	0738.5	0738.6	.7	425	10		
	6100	KISV			0900.0	0904		7			
	6100	KISV	45	C	0900.0	0901.9	5.0	11			
	6100	KISV	24	R	0905.0			3			
	5200	BERN	46	C	0905.3	0907.9	8.0	18.0			
	8400	BERN	46	C	0905.3	0907.8	8.0	21.0			
	3200	BERN	46	C	0905.3	0910.0	8.0	11.0			
	1470	POTS	40	F	0906.5	0908.5	4.5	30			
	3000	POTS	40	F	0906.5	0908.0	4.0	11			
	950	GORK			0906.8	0910.0		9			
	650	GORK			0906.8	0910.0		46			
	650	GORK	46	C	0906.8	0907.9	5.5	15			
	2950	GORK	45	C	0906.8	0908.0	4.6	8.4			
	2950	GORK			0906.8	0910.0		9.3			
	950	GORK	46	C	0906.8	0908.4	6.0	13			
	930	BORD	46	C	0906.8	0907.5	4.0	26	5		
	9500	POTS	40	F	0907.0	0908.0	6.0	7			
	9100	GORK	2	S/F	0907.7	0907.9	6.1	10			
	810	KRAK	42	SER	0908.0E	0908.5	2.0D	19			
	2650	DWIN	2	S/F	0911.0	0915	5.0	15	10		
	650	GORK			0931.3	0939.7		4.4			
	650	GORK	41	F	0931.3	0931.6	9.0	8.3			
	100	GORK	41	F	0934.5	0935 U	6.0	300 D			
	100	GORK			0934.5	0939.4		1100			
	127	TORN	47	GB	0934.9	0935.7	2.8	770 D			DISTURBED
	950	GORK	2	S/F	0938.3	0939.6	3.0	4			
	2950	GORK	1	S	0938.8	0939.8	1.8	1.0	.5		
	3100	CRIM			1006.5	1010.0		6			
	3100	CRIM	45	C	1006.5	1007.8	4.0	9	3		
	8400	BERN	4	S/F	1010.1	1111.0	2.0	17.0			
	3200	BERN	4	S/F	1010.3	1110.8	2.0	11.0			
	5200	BERN	4	S/F	1010.4	1110.8	2.0	21.0			
	810	KRAK	1	S	1015.5	1015.8	.5	11	5		
	810	KRAK	8	S	1039.0	1039.0	.1	17			
	9100	GORK	20	GRF	1101.5	1118.0	5.9	6.7	2.5		

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DAY OF MONTH	FREQUENCY	STATION	TYPE	STARTING TIME UT	TIME OF MAXIMUM UT	DURATION MINUTES	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1} PEAK	FLUX DENSITY MEAN	INT	POLARIZATION OR REMARKS
20	113	POTS	42 SER	1102.2	1110.5	11.0	3500	35		III/V
	930	BORD	41 F	1102.3	1102.5	1.7	14	2		
	810	KRAK	2 S/F	1105.5	1105.5	1.2	24	5		
	127	TORN	47 GB	1110.4	1110.9U	2.0	1100 D	550 D		SATURATED
	9500	POTS	1 S	1110.5	1111.0	1.5	5			
	3000	POTS	3 S	1110.5	1111.2	1.0	8			
	1470	POTS	1 S	1110.5	1111.0	2.0	4			
	930	BORD	46 C	1110.5	1110.6	1.4	25	4		
	3100	CRIM	1 S	1110.6	1111.2	1.0	8	3		
	29	UPIC	46 C	1110.7	1111	3.3				
	930	BORD	8 S	1233.2	1233.2	.1	17	1		
	9500	POTS	8 S	1249.5	1250.0	.8	14			
	2800	OTTA	1 S	1323.0	1326	10.0	2.8	1.4		
	810	KRAK	8 S	1343.8	1344.0	.2	14			
	8400	BERN	21 GRF	1441.3	1445.3	26.0	13.0			
	3200	BERN	21 GRF	1441.8	1445.1	30.0	23.0			
	5200	BERN	21 GRF	1441.8	1445.1	30.0	18.0			
	606	SGMR	4 SF	1442.6	1445.1	5.5D	80			
	930	BORD	46 C	1443.0	1449.6	9.0	48	6		
	245	SGMR	4 SF	1443.3	1444.8	3.5D	360			
	9500	POTS	20 GRF	1443.5	1445.0	19.0	6.9			
	1470	POTS	4 S/F	1443.5	1445.4	7.0	22			
	3000	POTS	4 S/F	1443.5	1445.5	8.5	23			
	2695	SGMR	4 SF	1443.6	1445.8	5.2D	31			
	2800	OTTA	4 S/F	1443.7	1445.3	7.3	28.0	9.3		
	1415	SGMR	8 S	1444.0	1445.3	1.0D	32			
	234	POTS	42 SER	1444.0	1450	8.2	1100	45		III
	113	POTS	42 SER	1444.2	1450	7.6	2000	45		III
	4995	SGMR	4 SF	1444.3	1445.3	3.2	16			
	2650	DWIN	2 S/F	1449.0U	459	8.0U	25	15		
	228	HARS	45 C	1449.4	1449.7	2.1	375	160		
	2800	OTTA	29 PBI	1451.0	1451	20.0	3.6	1.8		
	930	BORD	41 F	1519.0	1524.2	7.0	15	2		
	2800	OTTA	20 GRF	1600.0	1635	50.0	2.4	1.2		
	2800	OTTA	27AFRF	1730.0		130.0	4.0	3.1		
	2800	OTTA	24 R	1730.0	1750	20.0	4.0	2.0		
	2800	OTTA	1 S	1732.0	1734	5.0	3.2	1.5		
	9400	HUAN	S	1732.0	1733.6	3.3	14.9	7.2		0
	930	BORD	46 C	1732.0	1735.4	5.0	24	4		
	2800	OTTA	24P R	1750.0		80.0	4.0			
	2800	OTTA	26 FAL	1910.0	1940	30.0	-4.0	-1.4		
	2800	OTTA	46F C	1955.6	1956.7	8.0	12.4	4.2		
	2800	OTTA	20 GRF	2055.0	2115	55.0	2.4	1.2		
	100	HIRA	46 C	2255.4	2300 U	6.2	945	100		0
	500	HIRA	46 C	2255.7	2258.4	4.0	1200	60		SL
	1000	TYKW	45 C	2256.0	2258.7	4.0	10	1.5		
	2000	TYKW	45 C	2256.0	2258.7	5.0	4	1.5		
21	410	LEAR	43 NS	0145.1	0156.3	54.4	36			
	606	LEAR	43 NS	0445.0	0536.1	333.0D	119			
	410	LEAR	43 NS	0450.0	0537.1	328.0D	65			
	200	GORK	44 NS	0500.0E		420.0D		15		
	100	GORK	44 NS	0502.0E		67.0D		5		
	204	IZMI	44 NS	0600.0E		360.0D	96			
	29	UPIC	43 NS	0621.1	1138.8	594.1D				
	127	TORN	43 NS	0800.0	1022.3	440.0D	2900	5		V1
	430	KRAK	44 NS	0810.0E		350.0D	20	7		
	260	ONDR	44 NS	0814.0E		348.0D	192	6		
	100	GORK	44 NS	1014.0E		106.0D		5		
	245	SGMR	44 NS	1049.0E	1841.0	551.0U	1900			
	410	SGMR	43 NS	1049.0	1739.1	551.0D	260			
	245	PALE	43 NS	1653.0	1718.3	695.0	720			
	410	PALE	43 NS	1653.0	1712.6	695.0	62			
	200	HIRA	44 NS	2039.0E	2313	660.0D	25	10		WR
	245	LEAR	43 NS	2245.0	0826.8	692.0D	400			
	208	VORO	44 NS	2300.0E		360.0D		19		
	410	LEAR	43 NS	2352.3	2353.5	624.7D	33			
	2695	PENT	8 S	0029.5	0029.9	.5	9.4			
	100	HIRA	46 C	0029.6	0029.8	1.2	960	235		WL
	1000	TYKW	45 C	0029.6	0030.5	1.5	5	1		
	3750	TYKW	5 S	0029.6	0029.8	.5	5	2		
	2000	TYKW	5 S	0029.6	0029.8	.5	15	4		
	3750	TYKW	45 C	0122.0	0130.6	11.0	14	5		
	1000	TYKW	45 C	0125.0	0129.6	10.0	30	8		
	9400	TYKW	45 C	0125.0	0130	6.0	9	5		
	2000	TYKW	45 C	0126.0	0129.6	6.0	22	10		
	17000	NOBE	20 GRF	0127.2	0139.9	31.0	9			0
	9400	TYKW	29 PBI	0131.0		65.0	7	3		
	2000	TYKW	29 PBI	0132.0		75.0	4	1.5		
	3750	TYKW	29 PBI	0133.0		65.0	6	2		
	1000	TYKW	45 C	0307.0	0309.8	5.0	5	1		
	9400	TYKW	5 S	0309.0	0310.1	3.0	8	2.5		
	3750	TYKW	5 S	0309.0	0310.2	2.0	7	2.5		
	606	LEAR	8 S	0309.3	0309.8	1.5	31			
	410	LEAR	8 S	0309.3	0309.8	1.5	150			

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21	245	LEAR	8 S	0309.3	0310.1	2.0	270			
	1415	LEAR	8 S	0309.3	0309.6	1.3	11			
	2000	TYKW	5 S	0309.5	0309.8	1.5	12	3		
	606	PALE	8 S	0309.6	0309.8	.5	34			
	410	PALE	8 S	0309.6	0309.8	.7	130			
	4995	LEAR	8 S	0309.8	0309.8	1.0	08			
	2695	LEAR	8 S	0309.8	0309.8	.8	08			
	8800	LEAR	8 S	0309.8	0309.8	1.0	11			
	3750	TYKW	5 S	0323.0	0324	3.0	1.5	.5		
	1000	TYKW	45 C	0329.0	0331.2	4.0	5	1.5		
	3750	TYKW	5 S	0329.0	0331.5	4.0	12	4.5		
	2000	TYKW	5 S	0329.0	0331.5	4.0	7	3.5		
	9400	TYKW	45 C	0330.0	0331.4	5.0	8	3		RAIN
	2000	TYKW	30 PBI	0333.0		25.0	2	1		
	3750	TYKW	30 PBI	0333.0		45.0	3	1		
	410	LEAR	47 GB	0334.3	0337.5		59			
	208	VORO	46 C	0336.0	0337	10.0	76			
	208	VORO		0336.0	0340		76			
	245	LEAR	47 GB	0336.3	0337.6	6.8	150			
	1000	TYKW	5 S	0338.0	0338.7	2.0	3	1		
	606	LEAR	8 S	0338.3	0338.8	.7	35			
	410	PALE	8 S	0341.3	0341.6	.5	100			
	606	LEAR	8 S	0343.8	0344.1	1.3	20			
	4995	LEAR	8 S	0344.0	0344.3	1.1	08			
	1415	LEAR	8 S	0344.0	0344.3	1.1	16			
	8800	LEAR	4 SF	0344.0	0344.0	198.3	11			
	2695	LEAR	8 S	0344.0	0344.3	1.1	50			
	3750	TYKW	45 C	0344.0	0344.5	3.0	11	2		
	1000	TYKW	45 C	0344.0	0344.5	2.0	7	2		
	2000	TYKW	45 C	0344.0	0344.5	2.0	41	8		
	9400	TYKW	45 C	0344.0	0344.4	4.0	14	4		
	1000	TYKW	8 S	0347.7	0347.8	.3	8	2		
	2000	TYKW	8 S	0347.7	0347.8	.3	3	1		
	3750	TYKW	21 GRF	0420.0	0527	120.0	8	3		
	1000	TYKW	5 S	0424.0	0425.1	3.0	4	1.5		
	606	LEAR	4 SF	0424.3	0425.0	2.5	10			
	2000	TYKW	21 GRF	0425.0	0527	110.0	5	2		
	9400	TYKW	20 GRF	0430.0U	0527 U	110.0U	8 U	4 U		RAIN
	410	LEAR	4 SF	0442.0E	0444.6	3.5D	190			
	606	LEAR	4 SF	0442.0E	0445.0	3.5D	47			
	410	LEAR	8 S	0454.1	0455.0	1.0	200			
	606	LEAR	8 S	0454.8	0455.1	.7	32			
	650	GORK	21 GRF	0457.0E		423.0D				
	410	LEAR	47 GB	0458.5	0503.6	15.1	540			
	1000	TYKW	45 C	0502.0	0502.8	3.0	3	1		
	650	GORK		0502.4	0503.7		12			
	650	GORK	46 C	0502.4	0502.8	28.0	16			
	606	LEAR	47 GB	0502.5	0502.8	.1	25			
	245	LEAR	8 S	0503.5	0503.6	.3	81			
	1000	TYKW	8 S	0510.4	0510.5	.2	19	5		
	1000	TYKW	5 S	0520.5	0521.6	2.5	3	1		
	2000	TYKW	5 S	0521.0	0521.9	2.0	1	.3		
	2950	GORK	20 GRF	0526.0E	0536.0	40.0D	7.7			
	950	GORK	22 GRF	0531.2	0535.1	8.7	12			
	3750	TYKW	45 C	0534.0	0536.6	8.0	3	1		
	1000	TYKW	45 C	0534.5	0536.2	6.0	7	2		
	2000	TYKW	45 C	0534.5	0536.2	7.0	3	1		
	650	GORK	4 S/F	0534.6	0535.8	2.0	50			
	650	GORK	1 S	0538.8	0539.4	1.3	8.3	4		
	1000	TYKW	5 S	0548.1	0548.3	.5	5	1.5		
	3750	TYKW	20 GRF	0625.0	0640	30.0U	3	1.5		RAIN
	9100	GORK	1 S	0625.3	0625.5	.6	6.7	3.3		
	100	GORK	41 F	0632.3	0632.8	6.0	240 D			
	100	GORK		0632.3	0636.6		3200			
	950	GORK	2 S/F	0632.3	0635.0	3.7	4			
	650	GORK	2 S/F	0632.4	0632.9	4.5	2.8			
	1000	TYKW	5 S	0632.5	0632.9	1.0	3	1		
	100	HIRA	42 SER	0632.6	0632.8	6.0	810			0
	6100	KISV	1 S	0633.0	0633.8	1.5	4			
	410	LEAR	47 GB	0633.6	0635.6	2.4	20			
	9100	GORK	1 S	0633.7	0633.8	1.0	6.7	3.3		
	1000	TYKW	5 S	0634.7	0635.0	.8	6	2		
	113	POTS	4 S/F	0635.0	0635.8	3.2	350	20		III
	1000	TYKW	5 S	0635.3	0635.8	.8	4	1.5		
	245	LEAR	.8 S	0635.6	0635.6	.4	190			
	3100	CRIM	26 FAL	0642.0	0730.0		7			
	650	GORK	2 S/F	0645.8	0648.0	2.5	6.6			
	410	LEAR	8 S	0647.8	0648.0	.7	180			
	606	LEAR	8 S	0647.8	0648.0	.7	15			
	245	LEAR	8 S	0647.8	0648.0	.7	250			
	113	POTS	4 S/F	0701.0	0701.0	.5	400	15		III
	6100	KISV	3 S	0710.0	0711		4			
	1000	TYKW	45 C	0710.6	0711.1	1.5	6	1.5		
	650	GORK	46 C	0719.8	0720.7	4.9	49			
22	650	GORK		0719.8	0723.0		160			

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				UT	UT	MINUTES	PEAK	MEAN		
21	410	LEAR	47 GB	0721.1	0723.0	8.5	600			
	606	LEAR	47 GB	0721.6	0721.8	1.7	1100			
	113	POTS	42 SER	0802.5	0810.1	7.7	150	1		III
	100	GORK	8 S	0810.2	0810.3	.4	350 D			
	9500	POTS	1 S	0917.0	0917.5	1.0	6.7			
	430	KRAK	42 SER	0932.0	0936.0	12.0	29			
	536	ONDR	42 SER	0940.5	0942	23.0	41			
	100	GORK	8 S	0946.4	0946.7	.8	400 D			
	113	POTS	4 S/F	0946.6	0946.7	.2	100	25		III
	9500	POTS	8 S	1012.2	1012.4	.7	24			
	113	POTS	42 SER	1019.0	1019.9	5.7	420	8		III
	234	POTS	42 SER	1019.9	1019.9	3.8	335	2		III
	113	POTS	41 F	1033.6	1036.2	3.7	350	10		III
	6100	KISV	4 S/F	1035.0	1036.3	4.0	6			
	930	BORD	41 F	1036.2	1036.2	.4	14	2		
	430	KRAK		1122.5	1140.0		46			
	430	KRAK		1122.5	1119.0		72			
	430	KRAK		1122.5	1152.0		130			
	430	KRAK	42 SER	1122.5	1122.7	57.0	38			
	100	GORK	41 F	1132.7	1133.0	12.2	390 D			
	100	GORK		1132.7	1145.1		390 D			
	100	GORK		1132.7	1137.8		390 D			
	100	GORK		1132.7	1139.2		390 D			
	536	ONDR	42 SER	1155.0		69.0	52 D			
	410	SGMR	4 SF	1155.3	1156.6	2.5D	34			
	245	SGMR	4 SF	1157.8	1158.6	2.5D	150			
	606	SGMR	8 S	1158.1	1158.5	1.7	97			
	8800	SGMR	4 SF	1219.1	1222.6	5.7D	28			
	2695	SGMR	4 SF	1221.8	1222.6	2.3D	31			
	15400	SGMR	8 S	1222.1	1222.8	1.7	13			
	4995	SGMR	8 S	1222.3	1222.8	1.5D	29			
	1415	SGMR	8 S	1222.6	1223.3	1.0D	26			
	606	SGMR	8 S	1222.8	1223.0	.5D	20			
	113	POTS	4 S/F	1223.1	1223.4	.4	350	20		III
	234	POTS	8 S	1223.2	1223.3	.2	120	30		III
	5200	BERN	46 C	1245.0	1300.4	75.0	153.0			
	11800	BERN	46 C	1245.0	1300.4	60.0	475.0			
	2800	OTTA	21 GRF	1245.0	1250	30.0	3.6	2.2		
	3200	BERN	46 C	1245.0	1300.4	75.0	62.0			
	19600	BERN	46 C	1249.0	1300.4	60.0	300.0			
	930	BORD	41 F	1249.0	1254	6.0	26	2		
	808	ONDR	4 S/F	1251.5	1254.2	3.5	25	3.5		
	810	KRAK	42 SER	1253.0E	1253.5	4.0D	53			
	35000	BERN	46 C	1255.3	1300.5	30.0	112.0			
	8400	BERN	46 C	1255.3	1300.4	65.0	394.0			
	6100	KISV	45 C	1258.0	1300.4	8.0	137			
	6100	KISV		1258.0	1301.5		33			
	8800	ATHN	4 SF	1258.6	1300.6	13.2	440			
	4995	ATHN	4 SF	1258.6	1300.6	10.0D	139			
	4995	SGMR	4 SF	1258.6	1300.3	6.8D	110			
	4995	SGMR	8 S	1259.0	1300.5U	D	110			
	1415	SGMR	8 S	1259.0	1300.5U	D	139			
	10715	DWIN	45 C	1259.0	1300	4.0	450	100		
	2650	DWIN	45 C	1259.0	1300	4.0	40	20		
	9500	POTS	29 PBI	1259.0	1300.1	21.0	290			
	3000	POTS	29 PBI	1259.0	1300.5	16.0	46			
	228	HARS	45 C	1259.1	1300.0	1.6	445	135		
	2695	SGMR	4 SF	1259.1	1300.3	6.4D	39			
	2695	ATHN	4 SF	1259.1	1300.6	6.5D	49			
	606	SGMR	47 GB	1259.1	1300.1	3.7D	4000			
	15400	SGMR	4 SF	1259.1	1300.3	4.7D	330			
	410	SGMR	47 GB	1259.1	1300.1	3.7D	650			
	8800	SGMR	4 SF	1259.1	1300.3	4.0D	330			
	245	SGMR	47 GB	1259.1	1300.3	3.4D	1600			
	2800	OTTA	4 S/F	1259.2	1300.6	5.0	47.0	11.0		
	234	POTS	4 S/F	1259.2	1300.3	2.9	1900	60		III
	113	POTS	4 S/F	1259.2	1300.2	4.0	2800 D	100 D		III
	930	BORD	46 C	1259.4	1300.4	4.6	1630	7		
	808	ONDR	45 C	1259.5		8.5	100 D	16		
	127	TORN	47 GB	1259.5	1300.3	3.5	3600 D	470		
	1470	POTS	29 PBI	1259.5	1300.6	9.5	80			
	1415	ATHN	4 SF	1259.5	1300.1	5.6D	139			
	430	KRAK	47 GB	1300.0	1301.5	3.5	600 D	39		
	810	KRAK	47 GB	1300.0	1300.5	2.2	900 D	63		
	127	TORN	42 SER	1330.8	1332.8	10.0	1600			
	113	POTS	4 S/F	1331.0	1332.7	4.2	750	40		III/V
	245	SGMR	4 SF	1331.6	1334.0	3.4	130			
	430	KRAK	3 S	1332.5	1333.5	2.5	23	11		
	234	POTS	4 S/F	1332.6	1332.6	.2	300	50		III
	2695	ATHN	4 SF	1332.8	1334.1	2.5D	17			
	2800	OTTA	4 S/F	1333.0	1334	2.0	13.4	4.4		
	1470	POTS	3 S	1333.0	1334.1	2.0	10			
	10715	DWIN	1 S	1333.0	1334	2.0	20	10		
	2650	DWIN	1 S	1333.0	1334	2.0	20	10		
	2695	SGMR	8 S	1333.1	1334.1	1.9D	11			

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21	8800	ATHN	8 S	1333.3	1334.3	1.8	25			
	3000	POTS	4 S/F	1333.5	1334.4	1.5	12			
	1415	ATHN	4 SF	1333.6	1334.1	2.2D	10			
	4995	SGMR	4 SF	1333.6	1334.1	2.2D	22			
	8800	SGMR	4 SF	1333.6	1334.1	5.4D	22			
	4995	ATHN	3 S	1333.8	1334.3	1.3D	31			
	15400	SGMR	4 SF	1333.8	1334.1	2.8D	13			
	1415	SGMR	8 S	1333.8	1334.1	1.0D	13			
	9500	POTS	4 S/F	1334.0	1334.2	1.0	19			
	810	KRAK	2 S/F	1344.0	1344.3	.5	18	3		
	2800	OTTA		1355.0		45.0	4.4			
	930	BORD	8 S	1433.3	1433.4	.2	24	2		
	2800	OTTA	21 GRF	1445.0	1507	40.0	3.6	1.8		
	930	BORD	8 S	1455.6	1455.6	.2	44	2		
	245	SGMR	47 GB	1503.8	1504.3	2.2	910			
	228	HARS	45 C	1504.0	1504.3	1.3	335	110		
	127	TORN	4 S/F	1504.0	1504.7	2.0	4700	2300		
	2800	OTTA	8 S	1504.9	1505	.3	2.8			
	127	TORN	8 S	1518.8	1519.0	.8	1500 D	730 D		
	2800	OTTA	21 GRF	1540.0	1610	70.0	2.8	1.4		
	228	HARS	45 C	1608.4	1612.4	5.4	585	175		
	245	SGMR	47 GB	1609.3	1613.1	7.5D	5400			
	930	BORD	46 C	1610.0	1612.6	7.0	257	10		
	2695	ATHN	4 SF	1610.1	1613.1	6.0D	310			
	4995	ATHN	4 SF	1610.3	1613.3	5.7D	200			
	35000	BERN	46 C	1611.3	1613.2	4.0	100.0			
	8800	SGMR	4 SF	1611.5	1613.1	6.6D	360			
	3200	BERN	46 C	1611.5	1613.1	10.0	278.0			
	8400	BERN	46 C	1611.6	1613.1	6.0	378.0			
	8800	ATHN	4 SF	1611.6	1613.3	3.7	260			
	11800	BERN	46 C	1611.6	1613.1	6.0	379.0			
	410	SGMR	47 GB	1611.6	1613.1	5.5D	76			
	4995	SGMR	4 SF	1611.6	1613.1	6.4D	210			
	5200	BERN	46 C	1611.6	1613.2	10.0	268.0			
	15400	SGMR	4 SF	1611.8	1613.1	5.8	300			
	606	SGMR	4 SF	1611.8	1613.3	6.2D	67			
	2695	SGMR	4 SF	1611.8	1613.1	9.7D	210			
	1415	ATHN	4 SF	1611.8	1613.5	4.3D	59			
	19600	BERN	46 C	1612.0	1613.2	5.0	240.0			
	2800	OTTA	4 S/F	1612.0	1613.5	8.0	156.0	28.4		
	2650	DWIN	45 C	1612.0	1613	7.0	440	100		
	10715	DWIN	45 C	1612.0	1613	3.0	360	100		
	1415	SGMR	4 SF	1612.1	1613.5	6.9D	84			
	2800	OTTA	24OAR	1707.0	1720	13.0	5.0	2.8		
	245	SGMR	47 GB	1711.5	1711.8	.6D	6700			
	410	SGMR	47 GB	1711.5	1711.8	1.6	590			
	2800	OTTA	1 S	1711.6	1713	2.5	3.6			
	2800	OTTA	21 GRF	1730.0	1756	135.0	12.6	5.6		
	410	SGMR	4 SF	1743.1	1749.3	18.2D	160			
	606	SGMR	47 GB	1743.6	1746.8	17.7D	150			
	606	PALE	47 GB	1744.8	1750.6	16.0	220			
	410	PALE	47 GB	1745.8	1751.3	13.2	160			
	1415	SGMR	4 SF	1746.6	1751.3	12.6	20			
	1415	PALE	47 GB	1749.3	1754.1	8.2	23			
	245	SGMR	8 S	1800.8	1801.3	.8D	119			
	606	SGMR	8 S	1801.3	1801.3	.2	30			
	410	SGMR	47 GB	1801.3	1801.5	1.0D	630			
	2800	OTTA	1 S	1925.0	1925.4	1.0	4.0	1.0		
	2800	OTTA	8 S	2014.3	2014.9	.7	3.8			
	2800	OTTA	20 GRF	2129.0	2131	11.0	4.0	2.0		
	3750	TYKW	5 S	2141.0	2141.7	4.0	10	2.5		
	2800	TYKW	45 C	2141.3	2142.3	4.0	34	4.5		
	1000	TYKW	45 C	2141.3	2142.3	2.5	11	4		
	2800	OTTA	2 S/F	2141.3	2142	4.0	5.6	2.8		
	100	HIRA	46 C	2141.3	2141.9	2.1	220	66		
	200	HIRA	46 C	2141.3		1.3	100 D			0
	9400	TYKW	5 S	2252.5	2253.4	2.5	5	2		
	3750	TYKW	20 GRF	2310.0	2350	80.0	4	2		
	2695	PENT	20 GRF	2310.0	2350	60.0	2.4	1.2		
	2000	TYKW	20 GRF	2315.0	2345	60.0	2	1		
22	200	GORK	44 NS	0354.0E		422.0D		5		
	204	IZMI	44 NS	0600.0E		360.0D	45			
	29	UPIC	43 NS	0642.8		470.2D				
	127	TORN	44 NS	0700.0E	1012.0	500.0D	730			V2
	430	KRAK	44 NS	0752.0E	0908.5	284.0D	230			
	260	ONDR	44 NS	0800.0E		430.0D	189	13		
	245	PALE	43 NS	1652.0	1931.5	696.0	590			
	410	PALE	43 NS	1900.0	1931.1	568.0	82			
	200	HIRA	44 NS	2037.0E	2209	750.0D	18	6		0
	245	LEAR	43 NS	2245.0	0840.0	691.0D	470			
	208	VORO	44 NS	2300.0E		360.0D		14		
	208	VORO		0043.0	0046		150 D			
	208	VORO	41 F	0043.0	0045	4.0	150 D			
	1000	TYKW	45 C	0044.0	0045.0	3.0	2.5	1		

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22	2000	TYKW	45	C	0044.0	0046.2	3.0	3		.7			
	9400	TYKW	45	C	0044.0	0044.4	7.0	6		1.5			
	3750	TYKW	5	S	0044.0	0045.8	10.0	2.5		1			
	3750	TYKW	45	C	0202.0	0206.2	6.0	7		.5			
	100	HIRA	42	SER	0202.6	0204.6	4.3	100000	D				
	9400	TYKW	5	S	0204.3	0204.6	3.0	3		1.5			
	9400	TYKW	21	GRF	0220.0	0245	150.0	4		2			
	3750	TYKW	21	GRF	0221.0	0306	145.0	3		1.5			
	208	VORO	4	S	0321.0	0322	2.0	150	D				
	3750	TYKW	45	C	0321.7	0322.5	1.6	11		4.5			
	9400	TYKW	45	C	0321.9	0322.0	1.1	39		12			
	1000	TYKW	5	S	0322.0	0322.7	1.5	3		1			
	2000	TYKW	45	C	0322.0	0323.0	2.0	55		2			
	9400	TYKW	29	PBI	0323.0		20.0	2		1			
	3750	TYKW	29	PBI	0323.3		18.0	2		1.5			
	3750	TYKW	5	S	0346.0	0346.4	3.0	1.5		.5			
	9400	TYKW	45	C	0433.0	0435.0	4.0	9		2.5			
	2000	TYKW	21	GRF	0600.0	0730	130.0	D 6		3	D		
	2950	GORK	21	GRF	0600.0	0727.0	169.0	10		5			
	17000	NOBE	20	GRF	0601.5	0723.5	126.0	D 24					0,SUNSET
	3750	TYKW	21	GRF	0603.0	E 0730	130.0	D 11		6	D		
	2000	TYKW	21	GRF	0604.0	0612.5	56.0	3		1			
	200	HIRA	41	F	0606.1	0607.0	10.0	1600					WR
	100	HIRA	41	F	0606.2	0607.1	2.5	3600		1250			0
	200	GORK	41	F	0606.2	0606.8	10.0	55	D				
	200	GORK			0606.2	0609.0		260					
	6100	KISV	4	S/F	0606.5	0607	1.0	10					
	3750	TYKW	5	S	0606.5	0606.9	1.0	4		1.5			
	9100	GORK	1	S	0606.6	0607.0	.8	20		10			
	9400	TYKW	21	GRF	0607.0	E 0730	110.0	D 18		9	D		
	9400	TYKW	5	S	0607.0	E 0607	U 1.0	D 11	D	2.5	D		
	100	GORK	41	F	0607.4	0607.6	4.5	2180					
	100	GORK			0607.4	0611.0		710					
	3750	TYKW	28	PRE	0607.7	0607.9	2.3	3		2			
	3750	TYKW	5	S	0610.0	0612.5	10.0	6		4			
	9400	TYKW	20	GRF	0615.0	0635	45.0	5		3			
	3750	TYKW	30	PBI	0620.0		40.0	4		2			
	100	GORK			0635.5	0643.3		330					
	100	GORK	41	F	0635.5	0636.5	8.2	170	D				
	650	GORK	46	C	0636.1	0637.0	2.0	28					
	650	GORK			0636.1	0637.5		31					
	200	GORK	8	S	0642.0	0643.0	1.5	60	D				
	2000	TYKW	5	S	0642.0	0643.2	2.0	9		2.5			
	113	POTS	4	S/F	0642.0	0643	.9	700		175			III
	234	POTS	41	F	0642.1	0642.2	1.4	100		2			III
	200	HIRA	46	C	0642.4	0643.2	1.4	370		65			WR
	2950	GORK	1	S	0642.5	0643.1	1.8	12		6			
	950	GORK	1	S	0642.6	0643.1	3.0	5		2.5			
	1000	TYKW	5	S	0642.6	0643.2	1.6	5.5		2			
	650	GORK	1	S	0642.7	0643.2	2.7	3.5					
	100	HIRA	46	C	0642.9	0642.9	.8	800		590			WR
	3100	CRIM	1	S	0643.0	0643.3	1.0	18		6			
	3750	TYKW	45	C	0643.0	0643.1	.3	66		13			
	3100	CRIM	26	FAL	0645.0	0812.0		9					
	100	GORK	8	S	0705.3	0705.4	.2	290	D				
	430	KRAK			0752.0	E 0952.7		250					
	430	KRAK			0752.0	E 1224.5		53					
	430	KRAK			0752.0	E 1204.0		500	D				
	204	IZMI	5	S	0752.2	0752.5	.6	900		500			
	100	GORK	8	S	0752.3	0752.5	.7	290	D				
	200	GORK	8	S	0752.3	0752.5	.8	60	D				
	113	POTS	4	S/F	0752.3	0752.4	.5	800		150			III
	234	POTS	4	S/F	0752.3	0752.6	.5	335		80			III
	100	GORK	41	F	0810.4	0810.6	5.0	280					
	100	GORK			0810.4	0814.6		300	D				
	100	GORK			0810.4	0812.0		155					
	100	GORK			0810.4	0813.9		160					
	113	POTS	42	SER	0812.2	0814.6	3.0	800		25			III
	204	IZMI	5	S	0826.5	0826.5	.4	880		700			
	100	GORK			0826.7	0831.6		300					
	100	GORK			0826.7	0858.3		300	D				
	100	GORK			0826.7	0855.5		300	D				
	100	GORK	42	SER	0826.7	0826.8	31.7	300	D				
	100	GORK			0826.7	0843.9		300	D				
	234	POTS	42	SER	0826.7	0858.3	44.0	8600		1	D		III
	113	POTS	42	SER	0826.8	0858.3	32.0	3500		1	D		III
	650	GORK	23	GRF	0836.0	0903.0	204.0	D 5					
	6100	KISV	1	S	0858.0	0858.3	1.0	3					
	15000	KISV	0	S	0858.0	0858.3	.3	8					
	204	IZMI	5	S	0858.2	0858.3	.4	1575		900			
	9100	GORK	1	S	0858.2	0858.4	.9	11		6			
	3000	POTS	20	GRF	0925.0	0928.8	18.0	6					
	9500	POTS	20	GRF	0927.0	0935	29.0	5					
	2950	GORK	20	GRF	0927.0	0931.0	138.0	5					
	930	BORD	41	F	0946.4	0946.7	.2	14		2			

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22	810	KRAK	8 S	0946.5	0947.0	.5	14			
	113	POTS	42 SER	0946.8	0946.8	33.0	700	1 D		III
	234	POTS	42 SER	0947.9	0958.6	24.0	240	1 D		III
	127	TORN	45 C	1002.1	1003.5	3.0	270	60		
	3000	POTS	1 S	1003.0	1004.0	2.0	4			
	1470	POTS	8 S	1003.1	1003.1	.4	14			
	950	GORK	2 S/F	1003.1	1003.7	1.0	3			
	930	BORD	41 F	1003.2	1003.2	.9	17	2		
	810	KRAK	40 F	1034.5	1035.3	1.2	11	4		
	200	GORK	8 S	1059.6	1059.7	.6	60 D			
	950	GORK	8 S	1059.7	1100.0	.6	3			
	650	GORK	4 S/F	1059.7	1100.0	.5	24	8		
	113	POTS	8 S	1059.8	1059.8	.8	200	70		III
	113	POTS	42 SER	1138.1	1145.0	15.0	350	3		III
	100	GORK	41 F	1142.0	1142.8	11.0	460 D			
	100	GORK		1142.0	1145 U		460 D			
	127	TORN	42 SER	1142.3	1145.3	11.0	210			
	200	GORK	4 S/F	1142.4	1143.5	3.3	60 D			
	2650	DWIN	41 F	1143.0	1145	2.0	25			
	1470	POTS	40 F	1143.0	1143.8	2.5	4.3			
	950	GORK	1 S	1143.2	1143.5	1.0	2			
	536	ONDR	8 S	1143.2	1143.5	.5	20			
	650	GORK	8 S	1143.3	1143.5	.5	11	5		
	3000	POTS	40 F	1143.4	1143.5	2.1	14			
	650	GORK	8 S	1149.8	1149.9	.2	7			
	100	GORK		1150.2	1150.2		460 D			
	5200	BERN	3 S	1151.7	1152.5	2.0	12.0			ONLY PAPER REC
	3200	BERN	3 S	1151.7	1152.5	2.0	.0			ONLY PAPER REC
	6100	KISV	3 S	1152.0	1152.6	2.0	5			
	3000	POTS	40 F	1152.0	1152.6	3.0	6.0			
	9500	POTS	1 S	1152.5	1152.7	1.0	3.3			
	100	GORK		1152.7	1152.7		460			
	810	KRAK	8 S	1159.0	1159.0	.1	24			
	113	POTS	42 SER	1206.3	1206.3	5.0	150	1		III
	127	TORN	7 C	1210.7	1211.3	1.0	60	30		
	2650	DWIN	2 S/F	1222.0	1223	2.0	40	20		
	808	ONDR	45 C	1222.0	1222.8	2.0	108	9		
	3200	BERN	45 C	1222.2	1222.7	2.0	37.0			
	2800	OTTA	45 C	1222.3	1223	1.5	26.8	13.4		
	5200	BERN	45 C	1222.3	1222.6	2.0	41.0			
	11800	BERN	45 C	1222.5	1222.7	1.5	25.0			
	8400	BERN	45 C	1222.5	1222.7	1.5	33.0			
	6100	KISV	45 C	1222.5	1222.9	3.0	17			
	6100	KISV		1222.5	1223.3		16			
	930	BORD	46 C	1222.5	1222.7	1.4	226	13		
	9500	POTS	4 S/F	1222.5	1223.0	1.5	17			
	1470	POTS	4 S/F	1222.5	1223.5	3.5	21			
	3000	POTS	4 S/F	1222.5	1222.6	2.5	26			
	810	KRAK	4 S/F	1223.0	1223.3	1.5	900 D	5		
	6100	KISV	1 S	1235.5	1235.9	2.0	3			
	127	TORN	7 C	1235.7	1235.8	1.0	220	110		
	113	POTS	4 S/F	1235.8	1235.8	.8	1400	30		III
	113	POTS	8 S	1255.0	1255.0	.3	100	30		III
	113	POTS	4 S/F	1344.2	1344.2	.5	100	25		III
	113	POTS	42 SER	1412.9	1431.1	22.0	700	5		III
	2800	OTTA	21 GRF	1420.0		35.0D	5.0			
	3200	BERN	4 S/F	1429.3	1431.1	24.0	63.0			
	5200	BERN	4 S/F	1429.3	1431.1	24.0	119.0			
	228	HARS	27 RF	1430.0	1652	175.0D	40	10		SUNSET
	2650	DWIN	2 S/F	1430.0	1431	2.0	40	20		
	11800	BERN	4 S/F	1430.1	1431.4	20.0	38.0			
	8400	BERN	4 S/F	1430.1	1431.4	20.0	73.0			
	2800	OTTA	4 S/F	1430.2	1431.2	3.0	46.6	11.7		
	930	BORD	45 C	1430.4	1431.7	3.0	29	7		
	536	ONDR	1 S	1430.5	1431.7	3.0	9	5		
	3000	POTS	3 S	1430.5	1431.3	2.5	48			
	1470	POTS	3 S	1430.5	1431.3	4.5	27			
	808	ONDR	1 S	1430.6	1431.8	3.0	15	6		
	10715	DWIN	1 S	1431.0	1432	2.0	50	30		
	9500	POTS	3 S	1431.0	1431.4	2.0	40			
	228	HARS	45 C	1502.0	1502.5	.8	480	185		
	2800	OTTA	2 S/F	1508.0	1510.5	3.0	3.6	1.6		
	930	BORD	46 C	1509.0	1510.8	3.0	23	3		
	2800	OTTA	21 GRF	1540.0	1710	185.0	13.6	6.8		
	2800	OTTA	8 S	1642.2	1642.5	.8	2.2	1.4		
	930	BORD	46 C	1648.0	1658.4	28.0	55	4		
	2800	OTTA	21 GRF	1729.0	1735	20.0	3.6	1.8		
	2800	OTTA	1 S	1730.0	1730.9	1.8	4.6	2.0		
	930	BORD	46 C	1734.0	1736.1	6.0	26	3		
	2800	OTTA	1 S	1810.2	1810.8	1.0	2.2	1.1		
	2800	OTTA	21 GRF	1824.0	1827	11.0	3.2	1.6		
	2800	OTTA	1 S	1826.0	1826.5	1.0	6.4	2.2		
	2800	OTTA	8 S	1828.0	1828.5	.8	1.8	.9		
	2800	OTTA	21 GRF	1846.0	1852	25.0	2.2			
	2800	OTTA	1 S	1847.0	1848	2.0	1.8	1.3		

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22	2800	OTTA	1 S	1902.2	1902.5	3.0	2.6	1.8		
	2800	OTTA	8 S	1931.6	1931.7	.5	2.2	1.1		
	2800	OTTA	1 S	1944.0	1944.3	1.0	3.2	2.2		
	2800	OTTA	4 S/F	1948.5	1952	8.0	19.6	4.6		
	2800	OTTA	8 S	1959.0	1959.5	.5	7.2			
	2800	OTTA	2 S/F	2044.5	2045.8	3.0	3.6	1.8		
	2800	OTTA	3 S	2144.0	2144.5	3.5	75.0	18.8		
	17000	NOBE	4 S/F	2144.0	2144.3	.9	199			R
	500	HIRA	4 S/F	2144.0	2144.3	2.0	8	5		0
	9400	TYKW	5 S	2144.0	2144.3	3.0	260	35		
	3750	TYKW	5 S	2144.0	2144.4	3.0	115	25		
	1000	TYKW	5 S	2144.0	2144.4	5.0	31	8		
	2000	TYKW	5 S	2144.0	2144.4	3.0	36	10		
	3750	TYKW	5 S	2147.0	2148.0	3.0	5	1.5		
	9400	TYKW	5 S	2147.0	2148.0	3.0	10	3		
	200	HIRA	46 C	2200.2	2200.5	2.6	1600	290		0
	500	HIRA	46 C	2200.3	2202.6	5.0	110	15		WL
	3750	TYKW	45 C	2200.3	2200.8	4.5	24	7		
	2000	TYKW	45 C	2200.4	2200.8	3.5	87	9		
	1000	TYKW	45 C	2200.4	2200.8	5.5	38	8		
	9400	TYKW	45 C	2200.4	2200.7	3.5	50	10		
	2800	OTTA	45 C	2200.5	2200.9	4.0	46.6	10.8		
	100	HIRA	46 C	2201.5	2202.8	2.5	9500	1500		WL
	9400	TYKW	45 C	2217.0	2219.2	4.0	19	7		
	3750	TYKW	45 C	2217.0	2218.8	5.0	13	8		
	2800	OTTA	22 GRF	2217.0	2220	13.0	6.4	3.2		
	8800	PALE	4 SF	2217.1	2220.0	3.4	20			
	4995	PALE	4 SF	2217.3	2217.6	3.5	13			
	245	PALE	8 S	2217.8	2219.1	1.5	55			
	9400	TYKW	29 PBI	2221.0		35.0	6	3		
	3750	TYKW	29 PBI	2222.0		40.0	45	2		
	100	HIRA	46 C	2305.8	2306.8	1.4	7000	1220		0
	9400	TYKW	45 C	2306.0	2306.7	4.0	140	20		
	2000	TYKW	45 C	2306.0	2306.7	3.0	7	2		
	1000	TYKW	5 S	2306.0	2306.9	4.0	4	1.5		
	3750	TYKW	5 S	2306.0	2306.7	5.0	40	10		
	4995	MANI	4 SF	2306.0	2307.0	3.6D	110			
	4995	LEAR	8 S	2306.1	2306.6	1.2	77			
	8800	LEAR	4 SF	2306.1	2306.6	2.5	170			
	17000	NOBE	1 S	2306.2	2306.6	2.5	92			R
	8800	MANI	4 SF	2306.3	2307.0	3.3	220			
	4995	PALE	8 S	2306.3	2306.6	.7	69			
	8800	PALE	8 S	2306.3	2306.6	.5	130			
	245	LEAR	47 GB	2306.5	2306.6	.3	3900			
	15400	PALE	8 S	2306.5	2306.6	.3	110			
	15400	LEAR	8 S	2306.5	2306.6	.6	100			
	2695	LEAR	8 S	2306.5	2306.6	.3	17			
	2695	MANI	4 SF	2306.5	2377.1	2.6D	23			
	200	HIRA	8 S	2306.5	2306.7	.4	1650			0
	9400	TYKW	29 PBI	2310.0		10.0	5	1.5		
	9400	TYKW	5 S	2322.0	2322.7	2.5	5	2		
	410	LEAR	8 S	2327.0	2327.1	.3	94			
	245	LEAR	8 S	2327.1	2327.1	.2	100			
	3750	TYKW	5 S	2341.0	2341.7	4.0	34	8		
	8800	LEAR	8 S	2341.3	2341.8	1.5	20			
	100	HIRA	46 C	2341.4	2342.0	1.3	850	274		0
	9400	TYKW	5 S	2341.5	2341.7	2.5	21	6		
	2000	TYKW	5 S	2341.5	2341.7	1.5	10	4		
	1000	TYKW	5 S	2341.5	2341.8	2.5	9	3		
	2695	LEAR	8 S	2341.5	2342.1	.6	13			
	4995	PALE	47 GB	2341.5	2341.8	1.1	37			
	1415	LEAR	8 S	2341.5	2341.8	1.0	15			
	245	LEAR	8 S	2341.6	2341.6	.2	45			
	4995	LEAR	8 S	2341.6	2342.1	1.0	34			
	2000	TYKW	30 PBI	2343.0		5.0	2	1		
	3750	TYKW	45 C	2346.0	2348.4	4.0	7	2		
	2000	TYKW	5 S	2346.3	2346.6	1.0	2	.7		
	9400	TYKW	5 S	2347.0	2348.4	3.0	5	2		
	3750	TYKW	28 PRE	2350.0	2350.8	2.5	9	4		
	1000	TYKW	28 PRE	2350.0	2351.0	2.5	2	.5		
	2000	TYKW	28 PRE	2350.0	2350.8	2.5	52	7		
	9400	TYKW	28 PRE	2350.5	2351.4	2.0	14	6		
	4995	LEAR	47 GB	2350.6	2353.5	1430.5	170			
	4995	PALE	47 GB	2350.6	2353.5	9.2	139			
	100	HIRA		2351.1	2358.1		1400			0
	100	HIRA	46 C	2351.1	2353.7	10.6	5700	438		0
	208	VORO	46 C	2352.0	2354	13.0	150 D			
	208	VORO		2352.0	2357		62			
	1000	TYKW	45 C	2352.0	2353.6	7.5D	48	8 D		
	245	PALE	47 GB	2352.1	2352.6	.7	770			
	500	HIRA	45 C	2352.2	2354.3	4.0	48	16		0
	3750	TYKW	45 C	2352.5	2353.6	7.5D	111	20 D		
	9400	TYKW	45 C	2352.5	2353.5	7.5	360	60		
	2000	TYKW	45 C	2352.5	2355.5	8.5	60	10		
	15400	LEAR	47 GB	2352.5	2353.5	1431.9	440			

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22	410	LEAR	4	SF	2352.5E	2352.6	3.0D	05			
	8800	PALE	4	SF	2352.5	2353.5	1193.5	370			
	245	LEAR	8	S	2352.5	2352.6	.5	630			
	8800	LEAR	47	GB	2352.5	2353.5	1431.4	440			
	200	HIRA	46	C	2352.6	2353.0	8.3	600	110		0
	35000	NAGO	5	S	2353.0	2354	2.0	53			
	17000	NOBE	45	C	2353.0	2353.5	7.8	395			R
	2695	LEAR	4	SF	2353.0	2354.6	2.3	250			
	2695	PALE	8	S	2353.1	2354.6	2.0	230			
	15400	PALE	47	GB	2353.1	2353.5	1429.6	510			
	1415	LEAR	8	S	2353.3	2354.0	1.3	40			
	1415	PALE	8	S	2353.3	2354.0	1.2	38			
	606	LEAR	8	S	2353.3	2354.0	1.8	45			
	606	PALE	8	S	2353.3	2354.0	1.5	42			
	35000	NAGO	29	PBI	2355.0	2359	15.0	17			
23	410	LEAR	43	NS	0235.5	0808.8	460.5D	21			
	100	GORK	44	NS	0501.0E		135.0D		5		
	200	GORK	44	NS	0502.0E		463.0D		10		
	204	IZMI	44	NS	0600.0E		360.0D	45			
	29	UPIC	43	NS	0646.0	1010.4	325.5D				
	127	TORN	44	NS	0700.0E	1127.0	500.0D	530	4		V1
	260	ONDR	44	NS	0800.0E		421.0D	121	9		
	410	SGMR	43	NS	1046.0	1109.1	554.0D	100			
	245	SGMR	43	NS	1046.0	1523.0	554.0D	410			
	200	HIRA	44	NS	2035.0E	2215	750.0D	17	4		WL
	9400	TYKW	30	PBI	0000.0		60.0	5	2		
	2000	TYKW	31	ABS	0001.0	0012	85.0	-5	-2		
	3750	TYKW	31	ABS	0003.0E	0030	80.0D	-2	-1		
	1000	TYKW	31	ABS	0003.0E	0012	80.0D	-2.5	-1	D	
	9400	TYKW	5	S	0032.0	0033.6	4.0	35	10	U	INTERFERENCE
	17000	NOBE	29	PBI	0059.0	0000.8	23.0	20			0
	2000	TYKW	5	S	0108.0	0108.6	1.5	1.5	.5		
	1000	TYKW	5	S	0108.0	0108.6	2.0	4	1		
	3750	TYKW	5	S	0108.0	0108.6	2.0	2.5	1		
	500	HIRA	46	C	0108.0	0108.0	.8	60	30		MR
	200	HIRA	42	SER	0108.3	0108.4	29.0	240			0
	100	HIRA	42	SER	0108.3	0108.5	12.3	300			WR
	245	LEAR	8	S	0108.3	0108.6	.7	380			
	410	LEAR	8	S	0108.3	0108.5	.5	75			
	9400	TYKW	5	S	0153.0	0155	7.0	3	1.5		
	3750	TYKW	5	S	0154.0	0154.6	1.5	1	.3		
	410	LEAR	8	S	0207.8	0208.0	.3	40			
	245	LEAR	8	S	0208.0	0208.3	.5	130			
	208	VORO			0208.0	0210		150	D		
	208	VORO	41	F	0208.0	0209	2.0	150	D		
	9400	TYKW	5	S	0238.0	0238.3	1.0	3	1		
	1000	TYKW	21	GRF	0250.0	0331	220.0	9	3.5		
	2000	TYKW	21	GRF	0250.0	0331	220.0	6	3		
	3750	TYKW	21	GRF	0305.0	0331	205.0	6	3		
	500	HIRA	46	C	0308.0	0330.1	30.0	16	6		MR
	9400	TYKW	21	GRF	0310.0	0330	170.0	4	2		
	1000	TYKW	45	C	0310.0	0311.9	3.0	46	5		
	9400	TYKW	5	S	0310.5	0311.8	5.0	13	4		
	3750	TYKW	5	S	0310.5	0311.8	2.5	10	4		
	2000	TYKW	5	S	0310.5	0312.0	2.5	7	3		
	100	HIRA	41	F	0310.6	0311.9	2.4	1800			0
	15400	LEAR	8	S	0310.8	0311.8	1.5	11			
	2695	LEAR	8	S	0310.8	0312.0	1.5	10			
	1415	LEAR	8	S	0310.8	0311.1	1.7	09			
	245	LEAR	8	S	0310.8	0310.8	1.0	56			
	606	LEAR	8	S	0311.0	0311.1	1.5	13			
	200	HIRA	42	SER	0311.0	0311.2	34.0	310			WL
	208	VORO	41	F	0311.0	0313	6.0	94			
	410	LEAR	8	S	0311.1	0311.5	.5	119			
	8800	PALE	4	SF	0311.3	0311.6	15.5D	17			
	410	PALE	4	SF	0311.3	0311.5	15.5D	350			
	8800	LEAR	8	S	0311.5	0311.8	.6	15			
	4995	LEAR	8	S	0311.6	0311.8	.2	13			
	1000	TYKW	29	PBI	0313.0		7.0	3	1.5		
	2000	TYKW	29	PBI	0313.0		7.0	2	1		
	3750	TYKW	30	PBI	0313.0		10.0	2	1		
	3750	TYKW	5	S	0314.4	0314.7	1.0	2	.5		
	1000	TYKW	5	S	0320.0	0322	5.0	2	1		
	2000	TYKW	5	S	0320.0	0322	5.0	2	1		
	410	LEAR	4	SF	0320.1	0324.5	16.4	17			
	606	LEAR	4	SF	0320.5	0328.5	14.0	17			
	9400	TYKW	5	S	0401.4	0401.9	2.5	3	1		
	3750	TYKW	20	GRF	0410.0	0435.6	70.0	3	1		
	9400	TYKW	5	S	0531.0	0531.8	4.0	3	1		
	9100	GORK	1	S	0613.8	0616.4	5.3	7.5			
	9400	TYKW	45	C	0614.0	0616.4	4.0	8	3		
	9400	TYKW	29	PBI	0618.0		12.0	3	1.5		
	9100	GORK	23	GRF	0642.5	0709.8	74.4	36			
	950	GORK			0644.4	0656.5		28			

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23	950	GORK		0644.4	0703.9		54			
	950	GORK	46 C	0644.4	0653.1	26.0	74			
	3100	CRIM		0645.0	0647.2		11			
	3100	CRIM	45 C	0645.0	0646.2	3.0	11	2		
	6100	KISV		0645.0	0649.5		9			
	3000	POTS	45 C	0645.0E	0656.9	28.0D	510			
	6100	KISV		0645.0	0653.5		30			
	1470	POTS	45 C	0645.0E	0656.9	30.0D	39			
	9500	POTS	45 C	0645.0E	0656.0	89.0D	370			
	6100	KISV	46 C	0645.0	0655.5	45.0	269			
	3750	TYKW	28 PRE	0645.0	0646.4	10.5	23	6		
	6100	KISV		0645.0	0701		25			
	6100	KISV		0645.0	0647.5		23			
	6100	KISV		0645.0	0709.6		19			
	6100	KISV		0645.0	0646.5		32			
	6100	KISV		0645.0	0704.6		20			
	8800	ATHN	47 GB	0645.5	0656.5		520			
	4995	ATHN	8 S	0645.6	0656.5U	D	320			
	2695	ATHN	8 S	0645.6	0656.5U	D	270			
	113	POTS	42 SER	0645.6	0656.0	24.0	2800	35		III
	2000	TYKW	28 PRE	0645.7	0647.9	9.8	17	2		
	100	GORK	46 F	0645.8	0653.4		200 D			
	100	GORK	41 F	0645.8	0646.5U	23.0	200 D			
	100	GORK		0645.8	0650.5		200 D			
	100	GORK		0645.8	0703.2		1800			
	100	GORK		0645.8	0656 U		200 D			
	100	GORK		0645.8	0706.1		1400			
	100	GORK		0645.8	0708.2		1700			
	2950	GORK		0645.9	0653.2		23			
	2950	GORK		0645.9	0701.3		38			
	2950	GORK		0645.9	0656.5		203			
	2950	GORK	46 C	0645.9	0647.3	280.0	13			
	17000	NOBE	28 PRE	0645.9	0653.2	9.8	23			0
	650	GORK	1 S	0646.0	0646.3	2.5	3	1.5		
	9100	GORK	46 C	0646.0	0646.5	2.0	38			
	9100	GORK		0646.0	0647.5		25			
	1000	TYKW	28 PRE	0646.0	0647.4	9.7	6	2		
	15000	KISV	45 C	0646.0	0646.7	2.0	15			
	15000	KISV		0646.0	0646.3		10			
	9400	TYKW	28 PRE	0646.0	0646.4	9.5	37	8		
	5730	IRKU	45 C	0647.0	0647.5	2.0	38			R
	5730	IRKU		0647.0	0648.5		29			R
	1415	ATHN	8 S	0647.0	0653.3U	D	80			
	15000	KISV		0649.0	0656.6		22			
	15000	KISV	45 C	0649.0	0656.2	6.0	320			
	5730	IRKU	21 GRF	0650.0	0653.4	5.0	41			R
	4995	LEAR	4 SF	0652.5	0656.5	25.6	420			
	8800	LEAR	47 GB	0653.0	0656.5	24.6	520			
	1415	LEAR	4 SF	0653.0	0653.1	10.1	81			
	606	LEAR	4 SF	0653.0	0656.6	12.1	200			
	9400	TYKW	5 S	0653.0	0653.3	1.0	51	15		
	2000	TYKW	45 C	0653.0	0653.2	.6	42	7		
	1000	TYKW	45 C	0653.0	0653.2	.6	180	40		
	3750	TYKW	5 S	0653.0	0653.4	1.0	20	7		
	2650	DWIN	41 F	0653.0	0656	17.0	160			
	650	GORK	4 S/F	0653.0	0653.1	.6	16.5	6		
	3100	CRIM	1 S	0653.0	0653.5	1.0	15	5		
	9100	GORK	3 S	0653.0	0653.4	.8	46	20		
	15400	LEAR	47 GB	0653.1	0656.3	25.0	480			
	2695	LEAR	4 SF	0653.1	0656.6	15.7	200			
	8400	BERN	4 S/F	0655.0	0656.5	65.0	463.0			
	15000	KISV	29 PBI	0655.2		33.0	93			
	200	GORK	8 S	0655.3	0655.9	2.0	60 D			
	3200	BERN	4 S/F	0655.3	0656.5	65.0	288.0			
	5200	BERN	4 S/F	0655.3	0656.5	65.0	490.0			
	19600	BERN	4 S/F	0655.5	0656.3	45.0	532.0			
	35000	BERN	4 S/F	0655.5	0656.3	45.0	306.0			
	11800	BERN	4 S/F	0655.5	0656.3	65.0	455.0			
	500	HIRA	45 C	0655.5	0655.5	4.3	80	10		WL
	3100	CRIM	3 S	0655.5	0656.5	3.0	217	72		
	9400	TYKW	47 GB	0655.5	0656.5	3.5	500	170		
	2000	TYKW	45 C	0655.5	0656.6	3.5	86	30		
	3750	TYKW	45 C	0655.5	0656.6	3.5	355	100		
	9100	GORK		0655.6	0656.6		390			
	9100	GORK	46 C	0655.6	0655.9	3.0	240 D			
	245	LEAR	8 S	0655.6	0655.8	.2	55			
	17000	NOBE	45 C	0655.7	0656.4	4.3	487			R
	650	GORK		0655.7	0702.1		20			
	650	GORK		0655.7	0703.8		18			
	200	HIRA	41 F	0655.7	0655.8	1.5	285			WL
	650	GORK	46 C	0655.7	0656.6	10.5	19			
	5730	IRKU		0655.7	0701.3		47			R
	5730	IRKU		0655.7	0656.5		347			R
	5730	IRKU	45 C	0655.7	0656.1	8.0	347			R
	1000	TYKW	45 C	0655.7	0656.7	3.3	40	15		

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DAY OF MONTH	FREQUENCY	STATION	TYPE		STARTING TIME UT	TIME OF MAXIMUM UT	DURATION MINUTES	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1} PEAK	FLUX DENSITY MEAN	INT	POLARIZATION OR REMARKS
23	234	POTS	4	S/F	0655.7	0655.8	.3	120	20		III
	3000	IZMI	7	C	0655.8	0656.8	3.0	207	168		
	410	LEAR	8	S	0655.8	0656.0	.3	200			
	35000	NAGO	5	S	0656.0	0656	3.0	137			
	35000	NAGO	29	PBI	0659.0	0707	34.0	25			
	3750	TYKW	30	PBI	0659.0		25.0	6	3		
	9400	TYKW	30	PBI	0659.0		55.0	21	10		
	2000	TYKW	30	PBI	0659.0		15.0	3.5	2		
	1000	TYKW	30	PBI	0659.0		15.0	2	1		
	2000	TYKW	45	C	0659.5	0701.3	6.5	34	9		
	3000	IZMI	5	S	0659.5	0701.2	3.0	35	20		
	3100	CRIM	3	S	0659.5	0701.2	3.0	42	14		
	17000	NOBE	1	S	0700.0	0702.0	2.5	34			R
	1000	TYKW	45	C	0700.0	0702.9	11.0	50	7		
	9400	TYKW	45	C	0700.0	0702.0	25.0	27	10		
	3750	TYKW	45	C	0700.0	0701.2	20.0	45	6		
	15000	KISV	45	C	0700.5	0702	2.0	55			
	17000	NOBE	20	GRF	0702.5	0704.5	23.0	23			0
	3100	CRIM	29	PBI	0704.0	0704.2	13.0	7	2		
	15000	KISV	45	C	0704.0	0705	11.0	7			
	15000	KISV			0704.0	0709.5		6			
	2000	TYKW	42	SER	0706.3	0707.9	4.5	45	5		
	2000	TYKW	31	ABS	0714.0	0724	17.5	-2	-1		
	3100	CRIM	26	FAL	0715.5	0725.0		11			
	15000	KISV	1	S	0717.0	0717.5	1.0	7			
	9100	GORK	1	S	0717.3	0717.5	.6	9.5	4		
	2950	GORK	1	S	0717.3	0717.4	.6	3.5	1.7		
	2950	GORK	1	S	0725.5	0725.7	1.5	3	1.5		
	3750	TYKW	45	C	0725.5	0732.8	9.5	22	4		
	2650	DWIN	2	S/F	0731.0	0732	3.0	40	20		
	2000	TYKW	45	C	0731.5	0732.8	3.5	28	7		
	8800	LEAR	8	S	0731.5	0733.0	1.6	13			
	9100	GORK	1	S	0731.7	0732.4	3.5	13	6		
	930	BORD	41	F	0732.0	0733.6	2.3	32	2		
	3000	IZMI	5	S	0732.0	0733.0	2.3	30	20		
	1470	POTS	3	S	0732.0	0732.9	2.0	0.3			
	1000	TYKW	45	C	0732.0	0733.6	2.0	9	1.5		
	9400	TYKW	5	S	0732.0	0732.5	6.0	11	4		
	3000	POTS	3	S	0732.0	0732.9	3.0	28			
	9500	POTS	3	S	0732.0	0732.5	2.0	32			
	2695	LEAR	8	S	0732.1	0732.8	1.2	38			
	4995	LEAR	8	S	0732.1	0732.8	.9	18			
	2950	GORK	3	S	0732.7	0732.9	4.1	28	14		
	3750	TYKW	29	PBI	0735.6		25.0	4	1.5		
	430	KNAK	42	SER	0747.5		140.0	25			
	113	POTS	8	S	0748.0	0748.1	.8	100	30		III
	6100	KISV	4	S/F	0806.0	0808	4.0	5			
	3750	TYKW	5	S	0806.0	0808.1	3.5	3.5	1.5		
	9400	TYKW	5	S	0806.5	0808.1	3.5	12	4		
	9100	GORK	1	S	0806.8		2.1				
	950	GORK	1	S	0807.8	0808.1	.7	2	1		
	1000	TYKW	45	C	0808.0	0808.1	1.0	4.5	2		
	200	GORK	27	RF	0820.7	0842.8	99.0	20			
	2950	GORK	1	S	0825.3	0825.7	1.3	4	2		
	260	ONDR	8	S	0840.0	0840	.2	172			
	234	POTS	8	S	0840.0	0840.0	.8	260	90		
	2950	GORK	21	GRF	0926.3	1130.0	180.0E	5			
	9100	GORK	1	S	0927.4	0927.7	.5	4	2		
	113	POTS	4	S/F	0927.7	0927.8	.3	350	90		III
	8400	BERN	45	C	1003.5	1022.1	40.0	100.0			
	3200	BERN	45	C	1003.5	1018.3	40.0	57.0			
	5200	BERN	45	C	1003.5	1018.3	40.0	112.0			
	810	KNAK	1	S	1004.5	1004.8	.7	10	3		
	11800	BERN	45	C	1005.0	1022.1	40.0	140.0			
	9100	GORK	21	GRF	1006.2	1030.0	27.6	8			
	3000	POTS	40	F	1009.0	1018.5	24.0	53			
	127	TORN	49	GB	1009.4	1010.0	12.0	6000			
	100	GORK			1009.4	1017.4		2950			
	100	GORK			1009.4	1025.0		3550			
	100	GORK			1009.4	1019.5		4850			
	100	GORK	41	F	1009.4	1009.7	17.0	380 D			
	100	GORK			1009.4	1022.0		4850			
	930	BORD	41	F	1009.5	1009.8	.6	30	2		
	113	POTS	42	SER	1009.7	1019.8	17.0	6300	35		III
	6100	KISV	4	S/F	1012.0	1113.3	1.5	7			
	9100	GORK	1	S	1012.3	1013.2	1.2	7	3		
	2950	GORK	1	S	1012.9	1013.2	.6	6	3		
	1470	POTS	40	F	1013.0	1018.5	20.0	12			
	9500	POTS	40	F	1013.0	1022.5	22.0	90			
	4995	ATHN	4	SF	1015.3	1018.1	14.0D	110			
	2695	ATHN	4	SF	1015.3	1018.1	18.0D	139			
	1415	ATHN	4	SF	1015.8	1018.1	10.5	29			
	9100	GORK	46	C	1015.9	1017.2	11.0	53			
	9100	GORK			1015.9	1018.2		75			
	9100	GORK			1015.9	1022.2		100			

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				UT	UT	MINUTES	PEAK	MEAN		
23	2950	GORK	45 C	1016.0	1017.3	4.8	40			
	10715	DWIN	41 F	1016.0	1022	11.0	150	50		
	2650	DWIN	41 F	1016.0	1018	7.0	110	40		
	2950	GORK		1016.0	1018.4		50			
	6100	KISV		1016.0	1020.5		26			
	6100	KISV		1016.0	1018.3		66			
	6100	KISV		1016.0	1019.7		26			
	6100	KISV		1016.0	1022.1		33			
	6100	KISV	46 C	1016.0	1017.3	10.0	45			
	15000	KISV		1016.5	1018.3		23			
	15000	KISV		1016.5	1020.5		30			
	15000	KISV		1016.5	1017		21			
	15000	KISV	46 C	1016.5	1022.1	10.0	180			
	15000	KISV		1016.5	1019.7		21			
	950	GORK	1 S	1016.5	1017.1	2.3	5	2.5		
	8800	ATHN	47 GB	1016.5	1018.0	12.1	110			
	234	POTS	4 S/F	1017.5	1017.6	.1	150	35		III
	19600	BERN	45 C	1021.1	1022.1	3.0	180.0			
	430	KRAK	8 S	1034.5	1034.5	.1	28			
	808	ONDR	45 C	1101.0	1112.2	10.5	32	5		
	536	ONDR	42 SER	1101.0	1101.8	26.0	56			
	10715	DWIN	1 S	1101.0	1101.5	4.0	40	20		
	2650	DWIN	1 S	1101.0	1101.5	1.0	40	20		
	3100	CRIM	3 S	1101.0	1101.5	3.0	43	14		
	6100	KISV	4 S/F	1101.0	1101.5	2.0	23			
	15000	KISV	8 S	1101.0	1101.5	1.0	28			
	3200	BERN	3 S	1101.0	1109.3	16.0	90.0			
	8400	BERN	3 S	1101.1	1101.6	13.0	45.0			
	11800	BERN	3 S	1101.1	1101.5	13.0	42.0			
	5200	BERN	3 S	1101.1	1101.6	16.0	34.0			
	9100	GORK	3 S	1101.2	1101.6	1.1	3.5			
	3000	IZMI	5 S	1101.2	1101.7	4.0	27	16		
	650	GORK	4 S/F	1101.2	1101.5U	1.0	60 D			
	950	GORK		1101.2	1109.8		73			
	950	GORK	46 C	1101.2	1101.7	11.7	21			
	1470	POTS	3 S	1101.2	1102.0	4.8	29			
	9500	POTS	3 S	1101.2	1101.5	1.8	32			
	930	BORD	42 SER	1101.3	1109.8	10.7	155	6		
	2950	GORK	3 S	1101.4	1101.6	1.9	37			
	3000	POTS	3 S	1101.5	1101.6	2.5	40			
	8800	ATHN	8 S	1102.0	1102.3	.8	35			
	1415	ATHN	4 SF	1102.1	1102.5	4.9	32			
	4995	ATHN	8 S	1102.1	1102.1	1.4D	29			
	2695	ATHN	4 SF	1102.1	1102.3	2.7D	66			
	650	GORK	30 PBI	1102.1	1102.2	29.8	2			
	430	KRAK		1108.0	1109.2		600 D			
	430	KRAK	47 GB	1108.0	1108.0	2.3	600 D			
	3000	IZMI	5 S	1108.0	1109.0	3.0	43	23		
	3100	CRIM	3 S	1108.0	1109.3	4.0	76	25		
	650	GORK	2 S/F	1108.1	1109.5	2.7	10	2		
	1470	POTS	4 S/F	1108.2	1110.0	3.3	42			
	9500	POTS	3 S	1108.5	1109.6	4.0	25			
	6100	KISV	4 S/F	1108.5	1109.5	2.0	23			
	4995	ATHN	4 SF	1108.6	1110.3	3.7D	29			
	1415	ATHN	4 SF	1108.8	1110.3	3.3	57			
	810	KRAK	4 S/F	1108.8	1109.2	2.0	220	5		
	204	IZMI	41 F	1108.8	1109.5	1.5	750			
	9100	GORK	3 S	1108.9	1109.6	2.2	83			
	2650	DWIN	45 C	1109.0	1109.5	2.0	80	30		
	10715	DWIN	1 S	1109.0	1109.5	1.0	20	10		
	2950	GORK	3 S	1109.0	1109.4	2.0	63			
	15000	KISV	1 S	1109.0	1109.5	.5	12			
	3000	POTS	4 S/F	1109.0	1109.5	2.5	55			
	8800	ATHN	4 SF	1109.0	1110.3	2.6	50			
	2695	ATHN	4 SF	1109.5	1110.1	3.5D	75			
	100	GORK		1112.7	1123.5		360 D			
	100	GORK	41 F	1112.7	1113.6	15.7	360 D			
	100	GORK		1112.7	1126.5		360 D			
	430	KRAK	42 SER	1121.5	1126.0	6.7	120			
	4995	ATHN	4 SF	1121.5	1123.5	11.1D	73			
	2950	GORK	3 S	1121.7	1123.1	7.4	28			
	2695	ATHN	4 SF	1121.8	1124.6	9.5D	45			
	2650	DWIN	2 S/F	1122.0	1123	8.0	25	15		
	10715	DWIN	2 S/F	1122.0	1123	8.0	50	20		
	15000	KISV	45 C	1122.0	1123	5.0	25			
	6100	KISV		1122.0	1123.7		34			
	6100	KISV		1122.0	1125.7		24			
	6100	KISV		1122.0	1123.3		40			
	15000	KISV		1122.0	1125.9		14			
	9500	POTS	29 PBI	1122.0	1123	33.0	47			
	3000	POTS	29 PBI	1122.0	1123.8	28.0	30			
	6100	KISV	46 C	1122.0	1123	5.0	44			
	5200	BERN	3 S	1122.1	1123.0	30.0	72.0			
	11800	BERN	3 S	1122.1	1123.0	24.0	45.0			
	2695	SGMR	4 SF	1122.1	1123.0	4.0	21			

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DAY OF MONTH	FREQUENCY	STATION	TYPE	STARTING TIME	TIME OF MAXIMUM	DURATION	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1}		INT	POLARIZATION OR REMARKS
				UT	UT	MINUTES	PEAK	MEAN		
23	3200	BERN	3 S	1122.1	1123.0	30.0	33.0			
	8400	BERN	3 S	1122.1	1123.0	24.0	63.0			
	9100	GORK		1122.2	1125.8		30			
	9100	GORK	46 C	1122.2	1123.0	7.7	58			
	19600	BERN	3 S	1122.3	1123.2	13.0	25.0			
	8800	SGMR	4 SF	1122.3	1123.1	5.3D	21			
	4995	SGMR	4 SF	1122.5	1123.0	2.8D	36			
	1470	POTS	29 PBI	1122.5	1123.5	18.0	7.7			
	650	GORK	2 S/F	1122.6	1123.2	3.7	5			
	8800	ATHN	4 SF	1122.8	1123.6	9.0	65			
	204	IZMI	41 F	1123.5	1127.0	4.0	850			
	234	POTS	41 F	1125.8	1127.1	1.6	220	5		III
	113	POTS	4 S/F	1126.7	1126.7	1.3	2100	90		III
	2800	OTTA	21 GRF	1156.0	1159	21.0	5.4	2.7		
	9100	GORK	46 C	1200.8	1204.3	15.0	240 D			
		GORK		1200.8	1209.9		125			
	4995	ATHN	4 SF	1201.6	1203.3	6.2D	170			
	8800	ATHN	4 SF	1201.8	1203.3	5.5	390			
	2695	ATHN	4 SF	1202.0	1204.3	5.3D	64			
	2695	ATHN	4 SF	1202.0	1204.3	5.3D	64			
	2800	OTTA	4 S/F	1202.0	1202.5	4.0	42.0	7.8		
	9500	POTS	4 S/F	1202.0	1204.0	5.0	257			
	6100	KISV	45 C	1202.0	1204.3	10.0	161			
	6100	KISV		1202.0	1209.8		52			
	3100	CRIM	3 S	1202.0	1204.3	2.5	37	12		
	1415	ATHN	4 SF	1202.3	1203.1	4.2	13			
	1415	ATHN	4 SF	1202.3	1203.1	4.2D	13			
	8400	BERN	4 S/F	1202.4	1204.3	10.0	395.0			
	2950	GORK		1202.5	1209.7		38			
	2950	GORK	45 C	1202.5	1204.3	9.0	42			
	29	UPIC	46 C	1202.7	1204.4	4.9				
	5200	BERN	4 S/F	1202.7	1204.3	10.0	171.0			
	11800	BERN	4 S/F	1202.7	1204.3	10.0	375.0			
	3200	BERN	4 S/F	1202.7	1204.3	10.0	55.0			
	4995	SGMR	4 SF	1202.8	1204.1	10.2D	119			
	8800	SGMR	4 SF	1202.8	1204.1	10.2D	360			
	606	SGMR	4 SF	1203.0	1204.1	9.0D	40			
	2650	DWIN	41 F	1203.0	1204	10.0	40			
	10715	DWIN	45 C	1203.0	1204	11.0	490	100		
	3000	POTS	4 S/F	1203.0	1204.4	3.0	42			
	15000	KISV		1203.0	1209.7		128			
	15000	KISV	45 C	1203.0	1204.3	10.0	350			
	245	SGMR	47 GB	1203.1	1204.6	7.9	450			
	2695	SGMR	4 SF	1203.1	1204.3	8.9D	38			
	15400	SGMR	4 SF	1203.1	1204.1	8.0D	330			
	127	TORN	47 GB	1203.2	1208.7	9.0	2600			
	536	ONDR	41 F	1203.3	1204.5	8.0	14	2		
	1415	SGMR	4 SF	1203.3	1204.1	8.7D	26			
	19600	BERN	4 S/F	1203.4	1204.3	10.0	284.0			
	260	ONDR	4 S/F	1203.5	1204.5	1.5	202 D	27		
	430	KRAK	42 SER	1203.5	1204.5	6.5	300			
	113	POTS	45 C	1203.5	1208.5	8.6	850	35		III
	950	GORK		1203.6	1210.0		6			
	950	GORK	45 C	1203.6	1204.3	8.0	12			
	930	BORD	46 C	1203.6	1204	2.4	15	4		
	650	GORK		1203.7	1209.7		22			
	650	GORK	41 F	1203.7	1204.4	7.4	22			
	410	SGMR	4 SF	1203.8	1204.1	7.2D	119			
	35000	BERN	4 S/F	1203.9	1204.3	3.0	133.0			
	234	POTS	42 SER	1203.9	1209.8	6.8	300	4		III
	1470	POTS	4 S/F	1204.0	1204.9	3.0	23			
	810	KRAK	1 S	1204.0	1204.5	1.3	11	5		
	100	GORK		1206.5	1209.3		1000			
	100	GORK		1206.5	1211.0		4600			
	100	GORK	41 F	1206.5	1208.5	5.0	1700			
	2800	OTTA	8 S	1207.0	1207	.2	10.4			
	200	GORK	4 S/F	1208.0	1209.5	2.2	200 D			
	2695	ATHN	4 SF	1208.8	1209.8	3.2D	60			
	2800	OTTA	4 S/F	1209.0	1209.7	2.5	39.0	9.8		
	3000	POTS	4 S/F	1209.0	1209.5	2.0	30			
	1470	POTS	4 S/F	1209.0	1210.0	4.0	9.3			
	9500	POTS	4 S/F	1209.0	1209.5	4.0	98			
	8800	ATHN	4 SF	1209.1	1209.5	3.7	119			
	4995	ATHN	4 SF	1209.3	1209.6	3.5D	57			
	810	KRAK	1 S	1210.0	1210.5	1.0	4	2		
	2800	OTTA	21 GRF	1220.0	1610	450.0	14.4			
	2800	OTTA	1 S	1242.0	1243	2.5	2.8	1.3		
	536	ONDR	4 S/F	1253.1	1254.1	1.5	56	11		
	810	KRAK	2 S/F	1253.3	1253.5	1.5	54	4		
	650	GORK	4 S/F	1253.3	1253.8U	2.1	60			
	930	BORD	41 F	1253.4	1253.6	.4	45	2		
	2800	OTTA	8 S	1254.0	1254.1	.5	9.0	4.5		
	930	BORD	41 F	1443.4	1443.4	.6	30	2		
	2800	OTTA	1 S	1557.0	1558	3.0	2.2	1.1		
	15400	SGMR	4 SF	1735.8	1738.8	5.2	36			

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DAY OF MONTH	FREQUENCY	STATION	TYPE	STARTING TIME UT	TIME OF MAXIMUM UT	DURATION MINUTES	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1} PEAK	FLUX DENSITY MEAN	INT	POLARIZATION OR REMARKS
23	4995	SGMR	47 GB	1735.8	1736.3	4.0D	36			
	8800	SGMR	47 GB	1736.0	1736.3	4.1D	59			
	2800	OTTA	2 S/F	1736.0	1738.5	8.0	9.4	3.2		
	2695	SGMR	4 SF	1736.1	1737.1	3.9D	06			
	2800	OTTA	20 GRF	1927.0	1930	20.0	6.4	2.6		
	410	PALE	8 S	1927.8	1929.1	1.5	20			
	606	PALE	8 S	1927.8	1928.1	.8	28			
	245	PALE	8 S	1928.6	1929.0	.7	60			
	2800	OTTA	21 GRF	2055.0	2155	100.0	3.0	1.6		
	2800	OTTA	1 S	2114.0	2116	5.0	1.2	.6		
	8800	PALE	4 SF	2115.1	2115.8	2.2	35			
	100	HIRA	46 C	2115.5	2115.5	1.8	915	190		WL
	4995	PALE	8 S	2115.8	2115.8	.2	1E			
	100	HIRA	42 SER	2301.4	2313.5	20.4	10000			0
	245	LEAR	8 S	2313.3	2313.3	.2	170			
	2930	VORO	45 C	2350.0	2354	10.0	107			
24	200	GORK	44 NS	0500.0E		420.0D		1.0		
	204	IZMI	44 NS	0600.0E		360.0D	36			
	127	TORN	44 NS	0700.0E	1132.7	380.0D	1500	15		V1
	100	GORK	43 NS	0747.0U		253.0U		5		
	260	ONDR	44 NS	0800.0E		428.0D	88	7		
	245	SGMR	43 NS	1044.0	1244.1	556.0D	2600			
	245	PALE	43 NS	1905.3	1911.1	563.7D	100			
	200	HIRA	44 NS	2035.0E	0630	750.0D	20	8		0
	100	LEAR	43 NS	2246.6	2341.1	688.0D	990			
	208	VORO	44 NS	2300.0E		120.0D		17		
	245	LEAR	43 NS	2347.8	0739.0	627.2D	50			
	35000	NAGO	20 GRF	0110.0	0201	200.0	29			
	9400	TYKW	45 C	0155.0	0156.9	4.0	30	12		
	3750	TYKW	5 S	0155.0	0156.9	4.0	7	4		
	8800	LEAR	4 SF	0155.1	0156.8	7.0	36			
	4995	LEAR	4 SF	0155.1	0157.1	7.7	16			
	15400	LEAR	47 GB	0155.8	0203.6	7.8	26			
	2000	TYKW	21 GRF	0156.0	0202.2	35.0	3	1		
	17000	NOBE	20 GRF	0156.3	0159.9	25.0	17			0
	3750	TYKW	30 PBI	0159.0		90.0	4	1.5		
	9400	TYKW	30 PBI	0159.0		90.0	12	3.5		
	410	LEAR	8 S	0201.6	0201.8	1.0	39			
	9400	TYKW	5 S	0202.0	0202.2	.6	11	3		
	3750	TYKW	5 S	0202.0	0202.2	.6	2	5		
	9400	TYKW	5 S	0206.0	0206.3	2.0	16	3		
	1000	TYKW	5 S	0206.0	0206.5	3.0	3	.5		
	2000	TYKW	5 S	0206.0	0206.3	2.0	2	.5		
	3750	TYKW	45 C	0206.0	0206.3	2.0	11	2.5		
	2000	TYKW	21 GRF	0540.0	0544	120.0	2	1		
	3750	TYKW	21 GRF	0540.0	0544	120.0	4	2		
	9400	TYKW	21 GRF	0540.0	0545	120.0	5	2.5		
	17000	NOBE	21 GRF	0543.5	0625.4	60.0	11			0
	200	GORK	8 S	0557.8	0558.5	1.5	250 D			
	9100	GORK	21 GRF	0615.6	0626.8	19.0	9			
	9400	TYKW	45 C	0617.5	0619.1	2.5	16	4		
	6100	KISV	45 C	0618.5	0619.1	1.3	6			
	15000	KISV	45 C	0618.5	0619.1	1.0	17			
	6100	KISV		0618.5	0619.3		6			
	17000	NOBE	1 S	0618.6	0619.1	1.0	17			0
	8800	ATHN	4 SF	0618.6	0624.1	9.9	26			
	8800	LEAR	8 S	0618.6	0619.1	.9	24			
	15400	LEAR	8 S	0618.6	0619.1	.9	18			
	9100	GORK	1 S	0618.7	0619.2	1.0	13	6		
	4995	ATHN	4 SF	0621.3	0624.3	7.2D	20			
	8400	BERN	1 S	0621.5	0625.1	10.0	29.0			ONLY PAPER REC
	11800	BERN	1 S	0621.5	0625.1	12.0	29.0			ONLY PAPER REC
	19600	BERN	1 S	0621.5	0625.1	12.0	95.0			ONLY PAPER REC
	9400	TYKW	45 C	0623.0	0625.2	10.0	22	5		
	2695	ATHN	8 S	0623.6	0624.5	1.9D	37			
	3750	TYKW	5 S	0624.0	0625.3	2.0	38	6		
	6100	KISV	45 C	0624.0	0625.1	4.0	17			
	2000	TYKW	5 S	0624.0	0625.2	3.0	15	4		
	3100	CRIM	3 S	0624.0	0625.0	1.0	52	17		
	6100	KISV		0624.0	0625.9		10			
	5200	BERN	1 S	0624.5	0625.1	3.0	26.0			ONLY PAPER REC
	3200	BERN	8 S	0624.5	0625.1	2.0	.0			ONLY PAPER REC
	8800	LEAR	47 GB	0624.6	0625.1	2.0	36			
	950	GORK	4 S/F	0624.7	0625.0	14.0	22			
	2950	GORK	3 S	0624.7	0625.2	1.0	4.0	2		
	1000	TYKW	45 C	0624.7	0624.9	4.5	22	4		
	9100	GORK	45 C	0624.8	0625.2	1.6	17			
	650	GORK	45 C	0624.8	0624.9	2.2	53			
	650	GORK		0624.8	0625.7		24			
	9100	GORK		0624.8	0625.9		11			
	606	LEAR	8 S	0624.8	0625.0	1.3	33			
	4995	LEAR	8 S	0625.0	0625.1	.3	15			
	2695	LEAR	8 S	0625.0	0625.1	.5	31			
	3000	IZMI	5 S	0625.0	0625.1	.7	32	20		

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DAY OF MONTH	FREQUENCY	STATION	TYPE		STARTING TIME UT	TIME OF MAXIMUM UT	DURATION MINUTES	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1} PEAK	FLUX DENSITY MEAN	INT	POLARIZATION OR REMARKS
24	15000	KISV	1	S	0625.0	0625.1	.5	9			
	1415	LEAR	8	S	0625.1	0625.3	.4	16			
	950	GORK	29	PBI	0625.8	0626.0		4			
	3750	TYKW	29	PBI	0626.0		15.0	3	1.5		
	2000	TYKW	29	PBI	0627.0		10.0	2	1		
	9400	TYKW	5	S	0715.5	0715.8	.8	8	2		
	1000	TYKW	5	S	0715.6	0715.8	1.0	2	.5		
	2000	TYKW	5	S	0715.6	0715.8	1.0	2	.7		
	3750	TYKW	5	S	0715.6	0715.8	1.0	3	1		
	5730	IRKU			0716.0	0718.9		49			R
	5730	IRKU	45	C	0716.0	0717.9	5.0	27			L
	3750	TYKW	45	C	0717.0	0717.8	17.0	9	1.5		
	9400	TYKW	45	C	0717.0	0719.8	17.0	97	7		
	2000	TYKW	45	C	0717.0	0717.9	3.0	3	1		
	6100	KISV	45	C	0717.3	0719.9	3.0	35			
	6100	KISV			0717.3	0717.9		11			
	5200	BERN	3	S	0717.3	0719.8	5.0	22.0			
	8400	BERN	3	S	0717.3	0719.8	5.0	94.0			
	4995	ATHN	4	SF	0717.3	0719.6	3.0D	18			
	3200	BERN	3	S	0717.3	0717.8	2.0	8.0			
	8800	ATHN	4	SF	0717.3	0719.6	3.0	74			
	9100	GORK	45	C	0717.5	0717.8	2.6	16			
	2950	GORK	1	S	0717.5	0717.8	1.0	4	2		
	9100	GORK			0717.5	0719.8		93			
	100	GORK	8	S	0717.5	0718 U	.8	330 D			
	9500	POTS	42	SER	0717.5	0719.5	16.0	66			
	2695	LEAR	8	S	0717.6	0717.8	.5	17			
	4995	LEAR	4	SF	0717.6	0717.8	2.5	17			
	15400	LEAR	4	SF	0717.6	0719.8	2.5	60			
	8800	LEAR	4	SF	0717.6	0719.8	2.5	110			
	113	POTS	4	S/F	0717.7	0718.1	.6	140	25		III
	650	GORK	1	S	0718.0	0718.0	.2	1			
	11800	BERN	3	S	0718.9	0719.8	2.0	73.0			
	15000	KISV	8	S	0719.3	0719.9	1.0	57			
	10715	DWIN	3	S	0719.5	0720.0	1.0	110	50		
	17000	NOBE	1	S	0719.6	0719.9	.5	57			R
	17000	NOBE	29	PBI	0720.0	0720.1	8.0	11			Ø
	9100	GORK	29	PBI	0720.0	0720.2	18.0	9			
	1000	TYKW	45	C	0727.9	0728.1	.5	17	5		
	930	BORD	46	C	0728.0	0728.2	.4	20	2		
	410	LEAR	8	S	0731.6	0731.8	1.2	33			
	113	POTS	41	F	0736.9	0736.9	2.6	100	1		III
	200	GORK			0744.4	0809.5		55 D			
	200	GORK	41	F	0744.4	0745.5	28.5	55			
	200	GORK			0744.4	0800.2		55 D			
	3100	CRIM	1	S	0828.8	0829.0	1.0	6	2		
	9100	GORK	20	GRF	0835.0	0838.3	9.2	8			
	6100	KISV	4	S/F	0837.5	0838.3	1.0	4			
	950	GORK	1	S	0837.8	0838.5	1.1	4.5	2		
	606	LEAR	8	S	0837.8	0838.5	1.2	27			
	650	GORK	2	S/F	0838.0	0838.4	1.3	5	2.5		
	536	ONDR	8	S	0838.0	0838.5	.5	56			
	810	KHAR	2	S/F	0838.0	0838.3	.7	15	4		
	9100	GORK			0838.0						
	2950	GORK	1	S	0838.0	0838.4	.7	5	2.5		
	3100	CRIM	1	S	0838.0	0838.2	1.0	6	2		
	606	LEAR	8	S	0857.6	0857.6	.2	16			
	410	LEAR	8	S	0858.1	0858.8	.9	18			
	6100	KISV	27	RF	0906.0	0915	18.0	3			
	113	POTS	4	S/F	0906.3	0907.0	1.3	800	15		III
	9100	GORK	20	GRF	0907.2	0912.7	12.7	9			
	6100	KISV	1	S	0912.0	0912.7	1.0	6			
	2950	GORK	1	S	0912.5	0912.6	.3	2	1		
	410	LEAR	4	SF	0913.6	0915.3	2.4	02			
	245	LEAR	4	SF	0913.6	0914.1	3.0	24			
	200	GORK			0932.3	0937.3		440			
	200	GORK	41	F	0932.3	0933.9	6.3	55 D			
	9100	GORK	20	GRF	1054.3	1101.0	13.5	5			
	29	UPIC	42	SER	1058.2	1244.8	107.8				
	33	UPIC	42	SER	1058.3		107.7				
	100	GORK			1128.9	1129.9		150 D			
	100	GORK	41	F	1128.9	1129.1	4.0	150 D			
	100	GORK			1128.9	1132.5U		150 D			
	204	IZMI	41	F	1129.0	1132.5	8.5	1000			
	113	POTS	42	SER	1129.1	1129.1	8.1	750	10		III
	9100	GORK	20	GRF	1208.7	1210.6	10.9	8			
	6100	KISV	1	S	1209.0	1210.6	3.0	6			
	3100	CRIM	3	S	1209.5	1209.8	2.0	30	10		
	260	ONDR	42	SER	1237.0		8.0	206 D			
	228	HARS	45	C	1238.2	1238.7	1.2	270 D	100		
	234	POTS	42	SER	1238.3	1244.1	6.6	3100	25		III
	3000	POTS	3	S	1238.5	1238.9	1.5	9.0			
	113	POTS	42	SER	1238.8	1244.6	6.4	1250	50		III/V
	2800	OTTA	8	S	1238.8	1238.9	.5	3.2	1.6		
	1470	POTS	1	S	1238.9	1239.0	2.1	4.0			

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24	228	HARS	45 C	1242.6	1243.6	1.0	270 D	100		
	127	TORN	4 S/F	1244.1	1244.7	1.2	7500	3700		
	2800	OTTA	240 R	1245.0	1300	15.0	4.2	2.1		
	113	POTS	4 S/F	1356.1	1356.2	.8	140	10		III
	2800	OTTA	20 GRF	1420.0	1430	40.0D	3.6			
	113	POTS	42 SER	1438.3	1438.3	4.2	750	12		III
	2800	OTTA	23 GRF	1725.0	1743	155.0	5.0			
	2800	OTTA	45 C	1728.3	1733.3	9.0	29.4	9.4		
	2695	SGMR	4 SF	1728.6	1733.1	6.7D	27			
	9400	HUAN	S	1729.7	1744.2	28.5	10.6	6.5		Ø
	4995	SGMR	4 SF	1730.0	1733.1	5.8D	38			
	606	SGMR	8 S	1732.0	1732.6	1.5D	26			
	410	SGMR	4 SF	1732.0	1733.3	2.1D	89			
	8800	SGMR	4 SF	1732.1	1733.3	3.2	27			
	245	PALE	8 S	1732.3	1732.8	1.8	320			
	1415	SGMR	4 SF	1732.5	1733.3	2.1D	17			
	245	SGMR	8 S	1732.5	1732.8	1.3D	490			
	9400	HUAN	S	1732.6	1733.3	1.1	19.5	10.3		R
	4995	PALE	8 S	1733.0	1733.3	1.1	41			
	8800	PALE	8 S	1733.0	1733.3	1.1	48			
	2695	PALE	8 S	1733.0	1733.3	1.1	35			
	1415	PALE	8 S	1733.1	1733.3	1.0	20			
	606	SGMR	8 S	1806.0	1806.6	1.1D	26			
	245	PALE	47 GB	1806.8	1807.1	.5	740			
	245	SGMR	47 GB	1806.8	1807.1	.5	970			
	245	PALE	8 S	2120.8	2120.8	.7	180			
	2695	PENT	20 GRF	2220.0	2222	19.0	2.8	1.4		
	3750	TYKW	5 S	2220.0	2221.2	15.0	11	3		
	3750	TYKW	21 GRF	2240.0	2257	40.0	4	2		
	2000	TYKW	21 GRF	2240.0	2255	40.0	3	1.5		
	2695	PENT	20 GRF	2240.0	2255	37.0	3.6	1.8		
	208	VORO		2306.0	2344		150 D			
	208	VORO	42 SER	2306.0	2308	38.0	150 D			
	208	VORO		2306.0	2323		150 D			
	3750	TYKW	5 S	2306.5	2307.6	4.0	3	1		
	1000	TYKW	45 C	2307.0	2307.4	2.0	14	4		
	2000	TYKW	5 S	2307.0	2307.7	2.0	3	1		
	3750	TYKW	5 S	2339.5	2340.5	2.0	7	1.5		
	245	PALE	47 GB	2339.6	2342.6	4.4	2000			
	2695	PENT	1 S	2340.0	2340.5	2.0	6.8	3.0		
	1000	TYKW	45 C	2340.0	2343.2	5.0	12	4		
	2000	TYKW		2340.0	2340.5		6			
	2000	TYKW	45 C	2340.0	2342.9	4.0	8	3.5		
	1000	TYKW		2340.0	2340.7		8			
	410	LEAR	4 SF	2341.1	2341.1	4.7	13			
	3750	TYKW	5 S	2342.0	2342.8	3.0	6	2		
	3750	TYKW	21 GRF	2342.0	0005	40.0	4	2		
	245	LEAR	47 GB	2342.3	2342.6	.8	2100			
	2695	PENT	1 S	2342.3	2343	1.7	5.8	2.9		
	1415	LEAR	8 S	2342.6	2342.8	2.0	15			
	2000	TYKW	29 PBI	2344.0		45.0	3	1.5		
	3750	TYKW	5 S	2345.0	2347	5.0	3	1.5		
	1000	TYKW	29 PBI	2345.0		30.0	3	1		
25	200	GORK	44 NS	0500.0E		420.0D		5		
	410	LEAR	43 NS	0529.5	0744.0	284.5D	35			
	204	IZMI	44 NS	0600.0E		360.0D	60			
	100	GORK	43 NS	0628.0		332.0E		5		
	127	TORN	44 NS	0700.0E	0936.7	500.0D	23000	13		V2
	260	ONDR	44 NS	0755.0E		431.0D	209 D	11		
	33	UPIC	43 NS	0809.2		412.3D				
	29	UPIC	43 NS	0809.5	0936.8	410.3D				
	245	SGMR	43 NS	1042.0	1136.6	558.0D	620			
	200	HIRA	44 NS	2033.0E	2200	250.0D	13	9		WR
	208	VORO	44 NS	2200.0E		360.0D		13		
	245	LEAR	43 NS	2317.8	0929.8	654.2D	280			
	410	LEAR	8 S	0037.8	0038.3	.8	17			
	9400	TYKW	45 C	0056.0	0058.2	15.0	15	5		RAIN
	3750	TYKW	20 GRF	0056.0	0103	30.0	6	2		
	1000	TYKW	45 C	0136.2	0137.0	1.0	6	2		
	100	HIRA	42 SER	0153.7	0202.3	14.0	7200			Ø
	3750	TYKW	45 C	0202.0	0202.1	1.5	2	.7		
	9400	TYKW	45 C	0202.0	0202.1	1.5	13	2		RAIN
	1000	TYKW	45 C	0202.0	0202.2	2.0	5	1.5		
	2000	TYKW	5 S	0202.0	0202.7	2.0	2.5	1		
	245	LEAR	47 GB	0202.0	0202.1	.6	1100			
	245	PALE	47 GB	0202.0	0202.1	.6	940			
	245	LEAR	47 GB	0205.0	0205.1	1.5	660			
	245	PALE	47 GB	0205.0	0205.1	1.5	790			
	2000	TYKW	5 S	0205.0	0205.5	2.0	1.5	.5		
	1000	TYKW	5 S	0205.0	0205.4	2.0	1.5	.5		
	410	LEAR	8 S	0205.1	0205.1	.2	78			
	410	PALE	8 S	0205.1	0205.1	.2	96			
	3750	TYKW	21 GRF	0230.0	0257.5	70.0	5	2		
	2000	TYKW	21 GRF	0235.0	0250.5	60.0	3	1		

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25	1000	TYKW	42 SER	0248.0	0250.0	5.0	3	.5		
	3750	TYKW	5 S	0251.5	0251.8	1.5	1.5	.5		
	2000	TYKW	5 S	0251.5	0251.9	1.5	2	.7		
	245	LEAR	8 S	0309.3	0311.3	.5	56			
	1000	TYKW	42 SER	0309.5	0311.2	3.5	4	.5		
	3750	TYKW	28 PRE	0450.0	0507.4	68.0	6	3.5		
	2000	TYKW	28 PRE	0450.0	0544.6	68.0	5	2		
	410	LEAR	8 S	0450.6	0451.1	1.2	33			
	245	LEAR	47 GB	0451.1	0451.5	.7	560			
	9400	TYKW	45 C	0504.0	0506.8	6.0	34	12		RAIN
	6100	KISV	4 S/F	0505.5	0507	3.0	15			
	8800	LEAR	4 SF	0505.8	0506.8	2.7	39			
	245	LEAR	8 S	0507.1	0507.3	.5	200			
	1000	TYKW	5 S	0507.2	0507.6	1.0	4	1.5		
	9400	TYKW	29 PBI	0510.0		14.0U	9	5		
	410	LEAR	8 S	0526.1	0526.8	1.4	19			
	650	GORK	21 GRF	0535.2	0550.4	54.8	4.5			
	950	GORK	21 GRF	0542.0E	0609.0	39.0D	7			
	245	LEAR	8 S	0543.6	0543.6	.2	170			
	606	LEAR	8 S	0543.8	0544.1	.5	20			
	410	LEAR	8 S	0544.1	0544.3	.2	44			
	1000	TYKW	5 S	0549.0	0549.2	1.0	2	.5		
	6100	KISV	3 S	0557.0	0559	3.0	6			
	4995	LEAR	4 SF	0557.1	0558.8	6.0	11			
	9100	GORK	23 GRF	0557.2	0616.6	40.5	12			
	200	GORK	8 S	0557.8	0558.5	1.5	250 D			
	113	POTS	4 S/F	0557.8	0558.4	4.2	3600	700		III
	3750	TYKW	45 C	0558.0	0612.7	19.0	30	12 D		
	2000	TYKW	45 C	0558.0	0612.7	19.0	23	7 D		
	204	IZMI	45 C	0558.0E	0558.5	1.3D	3650	2500		
	3100	CRIM	1 S	0558.0	0559.0	3.0	12	4		
	1000	TYKW	45 C	0558.0	0558.9	19.0	15	3 D		
	1000	TYKW		0558.0	0612.8		11			
	234	POTS	4 S/F	0558.0	0558.5	1.9	1450	200		III
	500	HIRA	3 S	0558.0	0558.6	3.5	5	3		0
	200	HIRA	46 C	0558.0	0558.5	1.8	8400	1790		0
	100	GORK	8 S	0558.0	0558.8	1.0	1300			
	2950	GORK	21 GRF	0558.0	0609.0	21.3	7			
	245	LEAR	47 GB	0558.0	0558.5	4.1	750			
	4995	ATHN	4 SF	0558.1	0558.6	4.7	11			
	100	HIRA	46 C	0558.1	0558.3	1.5	14000	4400		0
	950	GORK	3 S	0558.1	0558.8	47.0	12	6		
	650	GORK	1 S	0558.2	0558.8	3.3	7	3.5		
	2950	GORK	1 S	0558.3	0558.7	1.5	8	4		
	2695	LEAR	8 S	0558.3	0558.8	1.0	19			
	1415	ATHN	4 SF	0558.3	0558.6	5.0D	22			
	2695	ATHN	4 SF	0558.3	0558.6	2.8D	20			
	1415	LEAR	8 S	0558.5	0558.8	.8	20			
	606	LEAR	8 S	0558.6	0558.8	.2	13			
	410	LEAR	8 S	0558.8	0558.8	.3	27			
	15000	KISV	45 C	0607.0	0612.6	10.0	29			
	6100	KISV	45 C	0607.0	0612.6	10.0	21			
	6100	KISV		0607.0	0615		21			
	15000	KISV		0607.0	0615		31			
	245	LEAR	8 S	0607.3	0607.5	.5	230			
	2695	LEAR	8 S	0607.6	0609.3	.2	15			
	410	LEAR	8 S	0608.3	0609.1	1.0	110			
	8800	LEAR	8 S	0608.5	0609.3	.1	16			
	4995	LEAR	8 S	0609.1	0609.3	.2	11			
	8800	ATHN	4 SF	0610.6	0614.6	9.4	24			
	8400	BERN	46 C	0611.5	0614.7	5.0	26.0			ONLY PAPER REC
	3200	BERN	45 C	0611.5	0614.7	5.0	.0			ONLY PAPER REC
	5200	BERN	46 C	0611.5	0614.7	5.0	25.0			ONLY PAPER REC
	11800	BERN	45 C	0611.5	0614.7	5.0	21.0			ONLY PAPER REC
	3100	CRIM	45 C	0612.0	0612.6	5.0	15	5		
	3100	CRIM		0612.0	0614.6		12			
	950	GORK	45 C	0612.1	0612.8	4.1	6			
	950	GORK		0612.1	0615.0		4			
	1415	ATHN	4 SF	0612.1	0612.6	4.5D	13			
	4995	ATHN	4 SF	0612.1	0614.8	4.5	22			
	2695	ATHN	4 SF	0612.3	0614.8	4.3D	18			
	2950	GORK	45 C	0612.3	0612.7	3.2	14			
	2950	GORK		0612.3	0614.9		10			
	3750	TYKW	30 PBI	0617.0		120.0D	10	7 D		
	2000	TYKW	30 PBI	0617.0		120.0D	5	4 D		
	9100	GORK		0619.0	0614.9		20			
	9100	GORK	46 C	0619.0	0612.7	4.5	19			
	6100	KISV	4 S/F	0624.5	0625.2	1.0	9			
	9100	GORK	1 S	0624.6	0625.0	.9	9	4.5		
	8800	LEAR	8 S	0624.8	0625.0	1.0	26			
	4995	LEAR	8 S	0624.8	0625.1	.3	10			
	100	HIRA	27 RF	0627.6	0650.6	49.3	25	8		0
	5200	BERN	1 S	0655.8	0656.3	3.0	9.0			ONLY PAPER REC
	3200	BERN	1 S	0655.8	0656.3	3.0	.0			ONLY PAPER REC
	2950	GORK	1 S	0656.0	0656.5	1.3	12	6		

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25	3100	CRIM	1 S	0656.0	0656.5	1.0	15	5		
	3750	TYKW	5 S	0656.0	0656.6	2.0	5	1.5		
	2000	TYKW	5 S	0656.0	0656.5	2.0	5	1.5		
	1000	TYKW	5 S	0656.2	0656.3	1.5	1.5	.5		
	410	LEAR	8 S	0711.3	0711.6	.5	490			
	245	LEAR	47 GB	0711.3	0711.6	.5	560			
	606	LEAR	8 S	0711.3	0711.6	.5	75			
	113	POTS	42 SER	0712.6	0728.3	16.0	3200	10		III
	234	POTS	42 SER	0712.6	0728.2	16.0	575	1 E		III
	200	HIRA	42 SER	0723.2	0801.3	47.0	5300			0
	9100	GORK	20 GRF	0738.9	0755.7	23.6	9			
	9500	POTS	22 GRF	0739.0	0755.7	22.0	8.5			
	3750	TYKW	5 S	0743.0	0752	25.0	4	2		
	100	GORK		0743.6	0751.7		420 D			
	100	GORK	41 F	0743.6	0743.7	8.6	420 D			
	100	GORK		0743.6	0745.5U		420 D			
	113	POTS	4 S/F	0743.8	0745.2	4.5	420	30		III
	2000	TYKW	45 C	0744.0	0752	24.0	6	2		
	3000	POTS	22 GRF	0744.0	0751.7	21.0	5.6			
	1470	POTS	22 GRF	0744.0	0745.5	21.0	3.7			
	2950	GORK	21 GRF	0744.0	0846.0	290.0D	8	4		
	200	GORK		0744.4	0809.5		55 D			
	200	GORK		0744.4	0800.2		55 D			
	200	GORK	41 F	0744.4	0745.5	28.5	55			
	650	GORK	2 S/F	0745.0	0745.4	1.7	12			
	950	GORK	3 S	0745.0	0745.5	3.5	9			
	930	BORD	46 C	0745.0	0745.7	4.0	16	3		
	1000	TYKW	45 C	0745.0	0745.5	1.5	14	3		
	245	LEAR	8 S	0745.3	0745.6	1.3	39			
	606	LEAR	8 S	0745.3	0745.5	.5	01			
	410	LEAR	8 S	0745.3	0745.6	1.0	10			
	1000	TYKW	45 C	0750.8	0751.1	1.5	4.5	2		
	410	LEAR	8 S	0759.5	0800.0	2.0	78			
	245	LEAR	8 S	0800.0	0800.3	.6	320			
	1000	TYKW	5 S	0800.0	0800.3	1.0	5	1.5		
	204	IZMI	41 F	0800.0	0801.5	3.0	3250			
	234	POTS	42 SER	0800.1	0801.8	12.0	10000	70		III
	113	POTS	42 SER	0800.1	0801.8	11.0	1600	20		III
	228	HARS	45 C	0801.5	0804.7	1.0	1100	250		
	430	KRAK	4 S/F	0801.5	0801.5	1.0	390	7		
	410	LEAR	8 S	0801.6	0801.8	.2	83			
	245	LEAR	47 GB	0801.6	0801.8	1.9	3900			
	1000	TYKW	45 C	0801.7	0802.0	1.5	6	3		
	430	KRAK	4 S/F	0825.5	0826.0	.6	137	4		
	113	POTS	4 S/F	0846.7	0847.1	1.3	700	10		III
	15400	LEAR	8 S	0847.5	0847.8	.5	79			
	4995	LEAR	8 S	0847.8	0847.8	.3	28			
	8800	LEAR	8 S	0847.8	0847.8	.3	51			
	2695	LEAR	8 S	0847.8	0847.8	.3	32			
	1415	LEAR	8 S	0847.8	0847.8	.2	13			
	930	BORD	41 F	0919.4	0919.4	.4	12	2		
	200	GORK	41 F	0932.3	0933.9	6.3	55 D			
	200	GORK		0932.3	0937.3		440			
	100	GORK		0932.8	0933.9		650 D			
	100	GORK	41 F	0932.8	0933.4U	5.6	650 D			
	100	GORK		0932.8	0937.3		40800			
	113	POTS	42 SER	0932.9	0936.6	11.0	5000	75 D		III
	234	POTS	42 SER	0932.9	0936.6	11.0	10000	60		III
	204	IZMI	42 SER	0933.0	0936.8	124.0	6370			
	430	KRAK	42 SER	0933.0	0936.7	9.5	190			
	2650	DWIN	2 S/F	0936.0	0936	3.0	15	10		
	930	BORD	46 C	0936.0	0936.8	3.0	25	4		
	410	LEAR	8 S	0936.3	0936.5	.3	139			
	650	GORK	1 S	0936.4	0936.7	4.5	5	2.5		
	9100	GORK	1 S	0936.5	0938.2	2.1	6	3		
	950	GORK	4 S/F	0936.5	0936.8	5.6	15			
	2950	GORK	1 S	0936.5	0936.7	2.0	10	5		
	1470	POTS	4 S/F	0936.5	0937.0	5.5	16			
	3100	CRIM	1 S	0936.5	0936.8	3.0	8	3		
	3000	POTS	4 S/F	0936.5	0936.8	2.5	11			
	204	IZMI	5 S	0936.5	0936.8	.8	6370	4000		
	245	LEAR	47 GB	0936.5	0936.6	1.8	13000			
	15400	LEAR	8 S	0936.5	0936.6	.3	35			
	1415	LEAR	8 S	0936.6	0936.8	.2	22			
	228	HARS	45 C	0936.6	0936.9	1.5	1275	270		
	810	KRAK	3 S	0936.7	0936.7	3.0	10	5		
	6100	KISV	27 RF	0956.0	1001	11.0	3			
	536	ONDR	8 S	1007.8	1007.8	.2	49			
	9500	POTS	3 S	1012.0	1013.5	3.0	18			
	11800	BERN	1 S	1012.7	1013.3	3.0	21.0			ONLY PAPER REC
	5200	BERN	1 S	1012.7	1013.3	3.0	12.0			ONLY PAPER REC
	9100	GORK	1 S	1012.7	1013.3	2.3	21	10		
	8400	BERN	1 S	1012.7	1013.3	3.0	26.0			ONLY PAPER REC
	6100	KISV	3 S	1013.0	1013.4	2.0	14			
	15000	KISV	1 S	1013.0	1013.4	1.0	9			

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25	9100	GORK	2 S/F	1023.8	1026.4	6.3	19			
	113	POTS	42 SER	1024.4	1030.4	30.0	800	10		III
	234	POTS	42 SER	1024.4	1054.0	30.0	900	1 E		III
	6100	KISV	1 S	1025.0	1026.4	2.0	3			
	650	GORK	1 S	1025.5	1028.5	4.9	8			
	536	ONDR	42 SER	1125.0	1415.5	216.0	31			
	113	POTS	42 SER	1127.2	1131.9	21.0	2800	8		III
	234	POTS	42 SER	1127.2	1136.6	21.0	1300	4		III
	9100	GORK	1 S	1132.3	1132.7	1.0	4	2		
	9100	GORK	1 S	1139.8	1140.1	1.6	3	1.5		
	113	POTS	4 S/F	1239.0	1239.2	.2	200	20		III
	113	POTS	42 SER	1252.1	1306.5	22.0	4500	30		III
	234	POTS	42 SER	1252.4	1307.1	22.0	1500	2		III
	245	SGMR	47 GB	1306.1	1307.0	3.7D	2400			
	127	TORN	4 S/F	1306.6	1306.9	1.6	7500	3800		
	228	HARS	45 C	1306.6	1306.9	1.0	590	300		
	410	SGMR	8 S	1306.8	1307.0	1.8	21			
	606	SGMR	8 S	1313.1	1313.5	.7	11			
	410	SGMR	8 S	1313.1	1313.8	.9D	36			
	245	SGMR	8 S	1313.1	1313.8	1.0D	200			
	2800	OTTA	1 S	1328.0	1328.8	4.0	2.6	1.3		
	9500	POTS	8 S	1417.4	1417.5	.6	46			
	113	POTS	42 SER	1420.4	1429.1	9.2	4500 D	15		III
	9400	HUAN	S	1446.8	1458.7	37.6	6.4	3.5		0
	9500	POTS	8 S	1447.5	1447.5	.4	24			
	113	POTS	42 SER	1456.2	1458.1	3.3	150	4		III
	234	POTS	4 S/F	1458.0	1458.1	.2	100	20		III
	2800	OTTA	1 S	1458.0	1459.2	2.0	7.8	1.9		
	410	PALE	8 S	1811.5	1811.6	.8	260			
	2800	OTTA	240AR	1837.0	1907	30.0	3.6	1.8		
	2800	OTTA	1 S	1839.0	1840.2	10.0	4.4	2.0		
	2800	OTTA	27A RF	1920.0		230.0	3.6	3.3		
	2800	OTTA	24 R	1920.0	1930	10.0	3.6	1.8		
	245	SGMR	47 GB	1920.6	1921.6	3.4D	840			
	606	SGMR	4 SF	1920.6	1921.5	2.2	18			
	410	SGMR	4 SF	1920.6	1922.3	3.2D	38			
	2800	OTTA	1 S	1921.0	1921.5	2.0	7.0	2.4		
	245	PALE	47 GB	1921.1	1921.6	1.7	880			
	606	SGMR	4 SF	1926.0	1921.5	2088.8	18			
	2800	OTTA	24P R	1930.0		200.0	3.6			
	245	PALE	8 S	1953.0	1953.1	.3	130			
	9400	HUAN	28 PRE	1954.2	2038.2	44.0	8.0	2.2		
	2800	OTTA	45 C	2038.0	2040.5	16.0	264.0	97.0		
	9400	HUAN	C	2038.2	2043.7U	13.6	1563.6	562.0		RØL
	200	HIRA	46 C	2043.0	2045.2	6.0	12000 U	1700 U		Ø,SUNRISE
	100	HIRA	46 C	2050.0	2051.2	3.3	7500	1950		WL
	9400	HUAN	29 PBI	2051.8	2051.8	46.0	31.4	9.5		Ø
	2800	OTTA	29 PBI	2054.0	2054	50.0	7.0	2.0		
	9400	TYKW	5 S	2239.7	2240.0	.6	13	4		
	2695	PENT	26 FAL	2250.0	2310	20.0	-3.6	-1.8		
	245	LEAR	8 S	2315.5	2316.1	.8	31			
26	200	GORK	44 NS	0452.0E		488.0D		10		
	127	TORN	44 NS	0700.0E	1101.2	500.0D	50	2		V1,DISTURBED
	260	ONDR	44 NS	0740.0E		453.0D	138	12		
	204	IZMI	43 NS	0830.0		210.0D	160			
	410	LEAR	43 NS	0902.5	0911.3	69.5D	32			
	33	UPIC	43 NS	0925.9		318.7D				
	29	UPIC	43 NS	0927.5	1122.4	317.5D				
	245	SGMR	43 NS	1041.0	1136.1	559.0D	260			
	200	HIRA	44 NS	2031.0E	0300	750.0D	10	5		WR
	200	VORO	44 NS	2200.0E		360.0D		12		
	245	PALE	4 SF	0039.3	0058.6	36.0	58			
	3750	TYKW	45 C	0223.0	0224.7	20.0	3	1.5		
	410	LEAR	8 S	0313.5	0313.8	.6	19			
	410	LEAR	8 S	0327.1	0327.5	1.0	11			
	5200	BERN	41 F	0441.0	1445.0	22.0	27.0			
	8400	BERN	41 F	0441.5	1445.0	24.0	45.0			
	2950	GORK	20 GRF	0521.0E	0618.0	82.0D	6	3		
	9400	TYKW	20 GRF	0610.0	0620	58.0	3	1.5		
	3750	TYKW	45 C	0613.0	0618.0	11.0	6	3		
	3750	TYKW	29 PBI	0624.0		25.0	3	1.5		
	8800	ATHN	8 S	0630.5	0631.0	.8	45			
	113	POTS	4 S/F	0710.8	0711.3	4.5	1750	20		III
	204	IZMI	41 F	0711.0	0714.0	5.3	900			
	2000	TYKW	45 C	0711.0	0712.3	7.0	5	1		
	9400	TYKW	45 C	0711.0	0714.4	10.0	11	3		
	3750	TYKW	45 C	0711.0	0711.6	10.0	6	1		
	1000	TYKW	42 SER	0711.0	0711.2	4.0	7	.5		
	234	POTS	42 SER	0711.2	0715.0	4.1	300	3		III
	200	GORK		0711.4E	0713.8		65 D			
	200	GORK	41 F	0711.4E	0711.6	4.0D	65 D			
	2950	GORK	1 S	0712.0	0712.2	.8	3	1.5		
	100	GORK	4 S/F	0712.0E	0713.5	2.7D	2800			
	245	LEAR	4 SF	0712.1	0715.0	3.0	260			

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26	410	LEAR	4 SF	0713.1	0713.6	2.4	11			
	536	ONDR	41 F	0750.0	0917.7	165.0	21	12		
	2950	GORK	21 GRF	0817.0	1030.0	250.0E	17			
	430	KRAK	42 SER	0827.5	0938.0	135.0	230			
	9100	GORK	20 GRF	0837.8	0838.7	18.2	6			
	650	GORK	20 GRF	0848.0	0919.0	168.0	9.5			
	430	KRAK	27 RF	0911.0	1010 U	90.0	12			
	6100	KISV	3 S	0913.0	0915.5	6.0	5			
	6100	KISV	3 S	0933.0	0939	8.0	9			
	1470	POTS	4 S/F	0936.0	0938.6	4.5	6.1			
	810	KRAK	4 S/F	0936.0	0938.0	5.0	4			
	950	GORK	2 SF	0936.0	0938.6	5.3	8			
	9500	POTS	1 S	0937.0	0938.6	3.0	10			
	3000	POTS	3 S	0937.0	0938.6	5.5	16			
	3100	CRIM	1 S	0937.0	0938.5	5.0	14	5		
	2950	GORK	1 S	0937.4	0938.6	4.4	11	5.5		
	3000	POTS	20 GRF	1008.0	1028.5	52.0	11			
	9500	POTS	20 GRF	1012.0	1030	48.0	12			
	3100	CRIM	21 GRF	1012.2	1014.0	62.0		1		
	1470	POTS	20 GRF	1015.0	1029.7	60.0	3.7			
	9100	GORK	20 GRF	1015.4	1028.0	48.0	5			
	113	POTS	8 S	1025.7	1025.8	.3	175	60		III
	430	KRAK	42 SER	1120.0	1124.5	15.0	35			
	113	POTS	46 C	1120.5	1123.6	40.0	1000	15		II&III
	2950	GORK	1 S	1120.8	1122.0	4.3	7	3.5		
	33	UPIC	48 C	1120.9		9.0				
	29	UPIC	48 C	1120.9	1122.4	9.3				
	100	GORK		1121.0	1128.3		1750			
	100	GORK		1121.0	1129.3		800			
	100	GORK	41 F	1121.0	1125.3	10.2	3500			
	9500	POTS	29 PBI	1121.0	1123.5	24.0	17			
	3100	CRIM	1 S	1121.0	1123.5	5.0	10	3		
	8400	BERN	46 C	1121.0	1123.3	6.0	26.0			
	3200	BERN	46 C	1121.2	1123.3	7.0	13.0			
	5200	BERN	46 C	1121.2	1123.3	7.0	18.0			
	9100	GORK	21 GRF	1121.4	1124.6	12.6	7			
	2950	GORK	2 SF	1121.5	1123.2	4.3	12			
	11800	BERN	46 C	1121.5	1123.3	3.0	30.0			
	3000	POTS	4 S/F	1121.5	1123.5	4.5	12			
	1470	POTS	4 S/F	1121.5	1124.5	4.5	9.5			
	6100	KISV	46 C	1121.5	1123.4	8.0	12			
	1415	ATHN	4 SF	1121.6	1131.0	17.2D	15			
	4995	ATHN	4 SF	1121.6	1123.3	7.4	17			
	2695	ATHN	4 SF	1121.6	1123.3	9.4D	10			
	8800	ATHN	4 SF	1121.6	1123.3	7.4	23			
	9100	GORK	1 S	1122.5	1123.4	1.2	17	8		
	810	KRAK	8 S	1123.8	1123.9	.2	74			
	3000	POTS	3 S	1129.0	1132	6.0	8			
	3100	CRIM	1 S	1129.0	1131.5	7.0	6	2		
	1470	POTS	3 S	1129.4	1130.4	8.1	14			
	2800	OTTA	21 GRF	1225.0	1310	65.0	2.8	1.6		
	2800	OTTA	1 S	1246.0	1247	2.0	2.8	1.2		
	430	KRAK	42 SER	1304.0	1322.0	25.0	58			
	1470	POTS	40 F	1325.0	1329.8	5.0	5			
	2800	OTTA	40 F	1426.0	1428.1	3.0	22.0			
	3200	BERN	4 S/F	1441.0	1445.0	22.0	18.0			
	1470	POTS	3 S	1441.5	1445.8	7.0	22			
	11800	BERN	4 S/F	1441.7	1445.0	24.0	39.0			
	2650	DWIN	2 S/F	1442.0	1445	5.0	20	10		
	2800	OTTA	21 GRF	1442.0	1447	18.0	5.4	2.7		
	606	SGMR	4 SF	1442.3	1444.8	6.8D	40			
	9500	POTS	3 S	1442.5	1445.0	5.0	29			
	2695	SGMR	4 SF	1442.6	1445.0	3.9D	19			
	2695	ATHN	4 SF	1443.0	1445.0	4.0D	26			
	1415	SGMR	4 SF	1443.8	1445.1	4.2D	22			
	2800	OTTA	3 S	1444.0	1445.2	3.0	11.6	4.0		
	3000	POTS	3 S	1444.0	1445.5	3.5	16			
	9400	HUAN	S	1444.6	1445.1	1.5	32.4	19.5		R
	1415	ATHN	4 SF	1444.6	1445.0	2.4D	15			
	4995	ATHN	4 SF	1444.6	1445.0	2.5	21			
	8800	SGMR	8 S	1444.6	1445.3	2.0D	35			
	15400	SGMR	8 S	1444.6	1445.1	1.2	22			
	8800	ATHN	4 SF	1444.6	1445.0	2.5	27			
	410	SGMR	8 S	1444.6	1444.8	.5D	54			
	4995	SGMR	8 S	1444.6	1445.1	2.0D	19			
	9400	HUAN	29 PBI	1446.1	1446.1	15.1	5.4	4.0		0
	2800	OTTA	40 F	1449.0	1449.3	6.0	3.6			
	2800	OTTA	23 GRF	1530.0	1840	410.0	8.2	4.1		
	2800	OTTA	1 S	1532.5	1533	1.0	3.6	1.5		
	2800	OTTA	1 S	1539.8	1540.2	1.0	2.0	1.0		
	2800	OTTA	22 GRF	1811.0	1813.8	20.0	8.4	2.8		
	9400	HUAN	S	1812.3	1821.1	24.1	12.6	6.5		0
	2695	SGMR	4 SF	1936.8	1938.8	5.5D	240			
	1415	SGMR	4 SF	1937.0	1939.1	5.0D	180			
	15400	SGMR	4 SF	1937.3	1939.0	5.2	21			

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DAY OF MONTH	FREQUENCY	STATION	TYPE		STARTING TIME	TIME OF MAXIMUM	DURATION	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1}		INT	POLARIZATION OR REMARKS
					UT	UT	MINUTES	PEAK	MEAN		
26	9400	HUAN	7	C	1937.4	1939.0	4.2	35.9	21.0		L
	245	SGMR	4	SF	1937.5	1940.3	6.0D	340			
	8800	SGMR	4	SF	1937.5	1941.5	9.0D	37			
	4995	SGMR	4	SF	1937.6	1940.3	8.9D	38			
	606	SGMR	4	SF	1937.8	1940.3	4.5D	139			
	2800	OTTA	4	S/F	1937.8	1939	5.0	200.0	20.0		
	1415	PALE	4	SF	1938.1	1939.0	2.7	220			
	2695	PALE	4	SF	1938.1	1939.0	2.7	310			
	8800	PALE	4	SF	1938.3	1940.6	3.0	49			
	245	PALE	4	SF	1938.6	1940.5	2.2	280			
	606	PALE	4	SF	1938.6	1940.3	3.0	170			
	410	SGMR	4	SF	1938.8	1940.5	3.7D	73			
	4995	PALE	4	SF	1938.8	1940.5	2.2	40			
	410	PALE	8	S	1940.1	1940.6	.9	86			
	15400	PALE	8	S	1940.1	1940.3	.5	24			
	9400	HUAN	29	PBI	1941.6	1941.6	22.8	9.0	4.6		0
	245	PALE	8	S	1947.0	1949.1	.3	63			
	2800	OTTA	1	S	1947.0	1948	2.5	2.6	1.3		
	2800	OTTA	1	S	2133.9	2134.3	4.0	3.6	1.8		
	245	PALE	8	S	2335.1	2335.3	.5	150			
	245	LEAR	8	S	2335.1	2335.3	.7	250			
	2000	TYKW	20	GRF	2343.0	2345	40.0	2	1		
	9400	TYKW	20	GRF	2343.0	2345	40.0	5	2.5		
	3750	TYKW	5	S	2343.0	2344.5	4.0	8	3.5		
	2695	PENT	1	S	2343.5	2344.5	2.0	3.6	1.8		
	3750	TYKW	29	PBI	2347.0		35.0	3	1.5		
27	200	GORK	44	NS	0500.0E		420.0D		5		
	260	ONDR	44	NS	0752.0E		428.0D	108	10		
	127	TORN	43	NS	0800.0	0924.0	480.0	120	4		V1
	245	SGMR	43	NS	1039.0	1259.3	561.0D	119			
	200	HIRA	44	NS	2030.0E	2127	190.0D	150	20		0
	100	HIRA	44	NS	2030.0E	2250	200.0D	140	40		MR
	245	PALE	43	NS	2037.0	2116.8	405.0D	440			
	200	VORO	44	NS	2200.0E		360.0D		10		
	245	LEAR	43	NS	2246.0	0949.3	686.0D	70			
	9400	TYKW	5	S	0053.0	0054.5	4.0	7	3		
	8800	LEAR	4	SF	0053.1	0054.1	2.7	18			
	3750	TYKW	5	S	0103.0	0104.7	10.0	2	.8		
	9400	TYKW	5	S	0155.0	0158.8	5.0	11	5		
	3750	TYKW	45	C	0156.0	0158.8	14.0	24	10		
	2000	TYKW	45	C	0156.0	0158.8	10.0	12	5		
	2695	LEAR	8	S	0158.3	0158.5	.8	33			
	4995	LEAR	8	S	0158.3	0158.8	.8	19			
	4995	PALE	8	S	0159.1	0159.5	.5	17			
	2695	PALE	8	S	0159.1	0159.5	.9	24			
	9400	TYKW	30	PBI	0200.6		240.0	6	3		
	410	LEAR	8	S	0200.1	0200.3	.2	24			
	4995	PALE	8	S	0201.8	0202.1	.3	13			
	2695	PALE	8	S	0202.0	0202.1	.1	18			
	2000	TYKW	30	PBI	0206.0		290.0	4	2		
	3750	TYKW	30	PBI	0210.0		250.0	4	2		
	410	LEAR	8	S	0212.3	0212.6	.5	25			
	245	LEAR	8	S	0212.3	0212.6	.5	17			
	606	LEAR	8	S	0212.3	0212.3	.2	08			
	410	LEAR	8	S	0241.6	0241.8	.2	32			
	410	PALE	4	SF	0241.6	0242.3	3.5	35			
	9400	TYKW	21	GRF	0245.0	0246.6	150.0	9	4		
	2000	TYKW	5	S	0245.0	0246.6	5.0	23	10		
	1000	TYKW	5	S	0245.0	0246.6	5.0	7	3.5		
	3750	TYKW	5	S	0245.0	0246.5	5.0	15	8		
	4995	LEAR	8	S	0245.8	0246.5	1.0	21			
	1415	LEAR	8	S	0245.8	0246.8	1.3	20			
	1415	PALE	8	S	0246.0	0246.6	1.1	20			
	2695	LEAR	8	S	0246.1	0246.6	.7	18			
	4995	PALE	8	S	0246.1	0246.5	.5	16			
	245	LEAR	8	S	0246.1	0246.8	.7	46			
	606	LEAR	8	S	0246.3	0246.5	.3	10			
	2695	PALE	8	S	0246.3	0246.6	.2	13			
	1000	TYKW	29	PBI	0250.0		30.0	2	1		
	2000	TYKW	30	PBI	0250.0		190.0	4	2		
	3750	TYKW	29	PBI	0250.0		130.0	4	2.5		
	2000	TYKW	5	S	0259.5	0300.3	2.5	1.5	.5		
	2000	TYKW	5	S	0344.0	0346	15.0	2	.8		
	15400	LEAR	8	S	0347.0	0347.1	.1	20			
	15400	PALE	4	SF	0403.1	0403.6	2.2	36			
	9400	TYKW	5	S	0438.6	0438.8	.5	18	4		
	3100	CRIM	1	S	0707.2	0704.0	3.0	3	1		
	113	POTS	4	S/F	0716.4	0716.5	.2	320	80		III
	100	GORK			0916.8	0924.1		150D			
	100	GORK			0916.8	0931.4		150			
	100	GORK	41	F	0916.8	0918.0	16.7	150 D			
	3000	POTS	20	GRF	0917.0	0919.3	5.0				
	1470	POTS	40	F	0917.5	0919.6	2.5	19			
	6100	KISV	3	S	1045.0	1046	3.0	5			

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DAY OF MONTH	FREQUENCY	STATION	TYPE	STARTING TIME UT	TIME OF MAXIMUM UT	DURATION MINUTES	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1} PEAK	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1} MEAN	INT	POLARIZATION OR REMARKS
27	6100	KISV	45 C	1112.0	1113	2.0	9			
	9100	GORK	1 S	1112.0	1112.5	3.5	6	3		
	810	KRAK	1 S	1332.0	1332.5	.5	8	4		
	9400	HUAN	S	1333.8	1334.7	2.4	6.8	2.6		L
	2800	OTTA	20 GRF	1625.0	1630	30.0	5.8	1.9		
	2800	OTTA	20 GRF	1700.0	1735	100.0	2.8	1.4		
	2800	OTTA	240 R	1955.0	2005	10.0	2.8	1.9		
	2800	OTTA	23 GRF	2125.0	2230	155.0	10.8	5.0		
	1000	TYKW	45 C	2200.0	2236.8	90.0	40	7		
	2000	TYKW	45 C	2200.0	2237.8	90.0	32	6		
	3750	TYKW	21 GRF	2200.0	2234 U	90.0	6 U	3 U		INTERFERENCE
	2800	OTTA	1 S	2200.8	2202.5	3.0	2.6	1.3		
	410	PALE	47 GB	2215.6	2222.0	14.4	100			
	245	PALE	47 GB	2216.0	2221.0	13.8	280			
	606	PALE	4 SF	2229.5	2222.0	2458.1	65			
	2800	OTTA	1 S	2233.8	2234	2.0	2.4	1.2		
28	260	ONDR	44 NS	0800.0E		352.0D	18			
	127	TORN	43 NS	0820.0	1102.2	280.0	40	.3		V1
	245	LEAR	43 NS	2340.0	0915.1	630.0D	20			
	3750	TYKW	5 S	0004.0	0005.0	2.5	19	7		
	1000	TYKW	5 S	0004.0	0005.0	2.5	2.5	1		
	2695	MANI	4 SF	0004.5	0005.3	2.1D	15			
	2695	PENT	3 S	0004.5	0005	1.5	14.4	7.2		
	4995	MANI	8 S	0004.6	0005.3	2.0D	24			
	8800	MANI	8 S	0004.6	0005.3	2.0	27			
	2695	PALE	8 S	0004.6	0005.0	1.0	21			
	4995	PALE	8 S	0004.8	0005.0	.8	25			
	8800	PALE	8 S	0004.8	0005.1	.8	28			
	3750	TYKW	5 S	0008.0	0009.4	3.5	2.5	1		
	9400	TYKW	5 S	0008.0	0009.4	3.5	10	3		
	3750	TYKW	5 S	0114.0	0115.5	5.0	2	.7		
	3750	TYKW	5 S	0413.0	0414.2	3.0	105	28		
	35000	NAGO	5 S	0413.0	0414	2.0	45			
	500	HIRA	46 C	0413.3	0414.5	1.5	85	30		WR
	100	HIRA	46 C	0413.4	0414.3	5.2	960	160		0
	200	HIRA	46 C	0413.5	0414.4	6.3	550	25		0
	1000	TYKW	5 S	0413.5	0414.4	2.5	18	7		
	9400	TYKW	5 S	0413.5	0414.3	2.5	255	60		
	2000	TYKW	45 C	0413.5	0414.2	2.5	58	20		
	606	MANI	8 S	0413.5	0414.5	2.0D	74			
	2695	MANI	8 S	0413.5	0414.3	2.0D	83			
	1415	MANI	8 S	0413.5	0414.5	2.0D	21			
	4995	MANI	8 S	0413.5	0414.5	2.0D	119			
	8800	MANI	8 S	0413.5	0414.5	2.0	250			
	17000	NOBE	3 S	0413.7	0414.2	1.7	138			0
	17000	NOBE	29 PBI	0415.0	0415.4	7.0	11			0
	2000	TYKW	29 PBI	0416.0		5.0	2	1		
	3750	TYKW	30 PBI	0416.0		5.0	2	1		
	1000	TYKW	29 PBI	0416.0		5.0	2	1		
	9400	TYKW	30 PBI	0416.0		10.0	6	2		
	9400	TYKW	5 S	0417.5	0417.8	1.5	8	4		
	3750	TYKW	5 S	0417.5	0417.8	.6	3	1		
	3750	TYKW	28 PRE	0500.0	0529	34.0	7	3		
	2000	TYKW	28 PRE	0500.0	0528	35.0	3	1.5		
	9400	TYKW	28 PRE	0500.0	0529	34.0	7	3		
	2950	GORK	21 GRF	0524.0E	0539.0	380.0D	14			
	650	GORK	28 PRE	0528.6	0529.0	3.1	4			
	4995	MANI	47 GB	0533.5	0536.1	6.3D	150			
	3200	BERN	46 C	0533.6	0536.1	9.0	45.0U			
	8400	BERN	46 C	0533.7	0535.1	9.0	320.0U			
	11800	BERN	46 C	0533.7	0535.1	9.0	390.0U			
	19600	BERN	46 C	0533.7	0539.0	9.0	120.0U			
	5200	BERN	46 C	0533.7	0536.0	9.0	250.0U			
	4995	LEAR	4 SF	0533.8	0536.1	4.3D	180			
	8800	LEAR	4 SF	0534.0	0535.8	3.6D	300			
	3750	TYKW	45 C	0534.0	0535.8	11.0	85	25		
	9400	TYKW	45 C	0534.0	0535.8	6.0	260	60		
	2695	LEAR	4 SF	0534.1	0535.6	3.5D	49			
	2695	MANI	47 GB	0534.3	0535.6	14.7D	47			
	4995	ATHN	4 SF	0534.3	0535.8	16.2D	160			
	9100	GORK	4 SF	0534.3	0535.3	2.9	240			
	8800	MANI	47 GB	0534.5	0535.8	4.5	250			
	8800	ATHN	4 SF	0534.6	0535.8	9.0	260			
	2695	ATHN	4 SF	0534.6	0535.8	15.7D	61			
	17000	NOBE	7 C	0534.6	0535.7	2.4	138			0
	15400	LEAR	4 SF	0534.6	0535.8	2.3	170			
	650	GORK		0534.9	0537.6		42			
	950	GORK	4 SF	0534.9	0535.6	7.0	28			
	650	GORK	46 C	0534.9	0535.7	1.1	50			
	650	GORK		0534.9	0539.6		31			
	650	GORK		0534.9	0546.7		32			
	2950	GORK	3 S	0535.0	0535.6	3.1	38	19		
	500	HIRA	41 F	0535.0	0535.4	8.6	33	6		MR
	2000	TYKW	45 C	0535.0	0535.6	5.0	47	13		

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28	1000	TYKW	45 C	0535.0	0535.7	2.0	40	7		
	410	LEAR	8 S	0535.0	0535.8	1.5D	20			
	606	MANI	47 GB	0535.0	0535.8	16.0D	33			
	606	LEAR	4 SF	0535.1	0535.8	15.4D	76			
	1415	LEAR	8 S	0535.1	0535.6	1.7D	45			
	1415	ATHN	4 SF	0535.1	0535.6	15.9D	24			
	1415	MANI	47 GB	0535.1	0535.6	14.4D	20			
	17000	NOBE	29 PBI	0536.9	0537.0	35.0	17			0
	1000	TYKW	30 PBI	0537.0		60.0	2	1		
	9100	GORK	29 PBI	0537.1	0537.2	53.0	32			
	2000	TYKW	30 PBI	0540.0		80.0	10	5		
	9400	TYKW	30 PBI	0540.0		70.0	24	11		
	3750	TYKW	30 PBI	0545.0		70.0	17	8		
	2000	TYKW	45 C	0548.0	0548.5	2.0	18	4.5		
	3750	TYKW	5 S	0548.0	0548.6	2.0	3	1		
	1000	TYKW	45 C	0548.0	0548.3	1.0	9	2		
	9400	TYKW	5 S	0548.0	0548.6	2.0	7	3		
	2950	GORK	1 S	0548.3	0548.5	.6	8	4		
	9100	GORK	22 GRF	0844.2	1034.7	151.0	11			
	33	UPIC	45 C	1040.5	1042	1.8				
	29	UPIC	45 C	1040.8	1042.4	1.8				
	9400	HUAN	S	1207.5	1215.3	15.0	16.8	8.4		0
	9500	POTS	40 F	1209.0	1212.0	16.0	45			
	3000	POTS	40 F	1210.0	1212.2	4.0	5.4			
	5200	BERN	46 C	1210.0	1212.1	4.0	8.0			
	8800	ATHN	4 SF	1210.0	1212.0	11.8	61			
	19600	BERN	46 C	1210.1	1212.0	3.0	85.0			
	11800	BERN	46 C	1210.6	1212.0	3.0	57.0			
	1415	ATHN	4 SF	1210.6	1212.0	14.0D	00			
	8400	BERN	46 C	1210.6	1212.0	9.0	40.0			
	2695	ATHN	4 SF	1210.8	1212.0	13.8D	00			
	606	SGMR	8 S	1210.8	1211.1	.8D	40			
	15400	SGMR	8 S	1211.0	1211.1	1.3	52			
	3200	BERN	46 C	1211.0	1212.1	4.0	5.0			
	8800	SGMR	4 SF	1211.0	1212.1	2.1D	34			
	4995	SGMR	8 S	1211.0	1212.0	1.8D	07			
	4995	SGMR	8 S	1211.0	1212.0	1.8D	07			
	15000	KISV	45 C	1211.0	1211.4	2.0	43			
	15000	KISV		1211.0	1212.1		43			
	1470	POTS	40 F	1211.0	1212.2	4.0	4.3			
	6100	KISV	4 S/F	1211.0	1212	3.0	11			
	2695	SGMR	8 S	1211.1	1212.1	1.9D	06			
	2800	OTTA	45 C	1211.1	1212.2	3.0	4.4			
	4995	ATHN	4 SF	1211.1	1212.1	12.9D	00			
	2695	SGMR	8 S	1211.1	1212.1	1.9D	06			
	430	KRAK	8 S	1211.3	1211.5	.5	220			
	9400	HUAN	8 S	1211.7	1212.2	.8	43.7	17.6		0
	430	KRAK	8 S	1212.3	1212.3	.1	55			
	3200	BERN	45 C	1504.0	1513.7	15.0	26.0			
	5200	BERN	45 C	1505.3	1513.7	15.0	27.0			
	9400	HUAN	S	1505.4	1513.7	34.4	15.1	5.6		L
	2650	DWIN	2 S/F	1506.0	1514	10.0	20	10		
	2800	OTTA	45 C	1506.0	1513.9	12.0	29.0	10.8		
	4995	ATHN	4 SF	1506.6	1513.8	10.4	13			
	2695	ATHN	4 SF	1506.6	1513.8	9.4D	22			
	1415	ATHN	4 SF	1506.6	1508.0	3.4D	00			
	127	TORN	45 C	1507.0	1508.7	8.0	420 D			
	245	SGMR	47 GB	1510.5	1511.0	4.0	100			
	606	SGMR	4 SF	1513.1	1513.3	6.2D	13			
	410	SGMR	8 S	1513.5	1513.8	.8D	33			
	2800	OTTA	29 PBI	1518.0	1518	25.0	3.2	1.5		
	2800	OTTA	24 R	1600.0	1620	20.0	3.6	1.8		
	2800	OTTA	27A RF	1600.0		240.0	3.6	3.0		
	2800	OTTA	24P R	1620.0		160.0	3.6			
	2800	OTTA	20 GRF	1802.0	1805	13.0	2.6	1.3		
	2800	OTTA	26 FAL	1900.0	2000	60.0	-3.6	-1.8		
	9400	HUAN	S	1917.8	1935.6	46.5	11.8	4.9		0
	15400	PALE	8 S	1928.1	1928.3	.5	40			
	15400	PALE	4 SF	1930.8	1932.1	2.8	41			
	2800	OTTA	240 R	2056.0	2059	3.0	2.6	1.0		
	3750	TYKW	21 GRF	2245.0	2330	160.0	6	3		
	2695	PENT	20 GRF	2250.0	2330	80.0	2.6	1.3		
	2000	TYKW	21 GRF	2300.0	2330	90.0	2	1		
	9400	TYKW	21 GRF	2305.0	2400	90.0	8	4		
	245	LEAR	47 GB	2330.8	2331.8	2.0	750			
	410	LEAR	4 SF	2330.8	2331.8	2.5D	42			
	606	LEAR	8 S	2332.0	2332.1	.5D	13			
	2000	TYKW	5 S	2332.0	2332.6	2.0	2	.5		
	3750	TYKW	5 S	2332.0	2332.4	1.0	1	.3		
	1000	TYKW	5 S	2332.0	2332.7	2.0	3.5	1		
	200	HIRA	46 C	2332.0	2332.0	1.1	1600	60		0
	245	LEAR	8 S	2335.1	2335.5	1.0	45			
	245	PALE	8 S	2337.3	2337.5	.8	30			
	9400	TYKW	5 S	2351.5	2352.2	1.5	5	1.5		
29	245	LEAR	43 NS	0030.0	0535.5	579.0D	170			

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29	260	ONDR	44 NS	0630.0E		398.0D	24			
	127	TORN	43 NS	0730.6	1055.3	300.0D	40	1		V1
	3750	TYKW	5 S	0011.0	0011.4	1.0	1.5	.5		
	9400	TYKW	21 GRF	0140.0	0320	390.0	12	6		
	3750	TYKW	21 GRF	0140.0	0320	390.0	14	6		
	2000	TYKW	21 GRF	0140.0	0320	390.0	8	3		
	9400	TYKW	21 GRF	0143.0	0205	50.0	4	2		
	3750	TYKW	20 GRF	0152.0	0207	35.0	4	2		
	245	PALE	8 S	0203.1	0203.3	.5	30			
	9400	TYKW	5 S	0227.0	0227.8	2.0	4	1.5		
	3750	TYKW	45 C	0238.0	0245.2	22.0	10	3		
	2000	TYKW	45 C	0239.0	0245.2	21.0	5.5	2.5		
	1000	TYKW	45 C	0246.3	0246.9	1.0	9	3		
	2695	LEAR	8 S	0258.6	0258.6	.2D	07			
	15400	LEAR	8 S	0258.6	0258.6	.2	20			
	9400	TYKW	45 C	0404.0	0409.8	14.0	10	4		
	1000	TYKW	45 C	0404.0	0411.4	11.0	9	1.5		
	3750	TYKW	45 C	0404.0	0409.8	15.0	27	6		
	2000	TYKW	45 C	0404.0	0409.7	14.0	18	4		
	2000	TYKW	29 PBI	0418.0		50.0	1	.5		
	9400	TYKW	30 PBI	0418.0		40.0	4	2		
	3750	TYKW	29 PBI	0419.0		40.0	5	2		
	9400	TYKW	5 S	0429.0	0430.4	4.0	3	1		
	2950	GORK	20 GRF	0514.0E	0536.0	170.0D	6	3		
	3750	TYKW	5 S	0527.0	0536	23.0	4	2		
	9400	TYKW	5 S	0634.0	0634.8	2.0	3	1		
	2000	TYKW	20 GRF	0640.0	0700	50.0	1	.5		
	3750	TYKW	20 GRF	0645.0	0705	50.0	2	1		
	9100	GORK	21 GRF	0648.3	0702.0	39.0	7			
	9400	TYKW	21 GRF	0655.0	0707	35.0	6	3		
	8400	BERN	20 GRF	0703.0	0715.1	30.0	15.0U			
	11800	BERN	20 GRF	0705.7	0715.1	30.0	25.0U			
	19600	BERN	20 GRF	0705.7	0715.1	24.0	25.0U			
	9400	TYKW	5 S	0714.3	0715.3	3.0	7	2.5		
	9500	POTS	29 PBI	0714.5	0715.4	26.0	7.0			
	9100	GORK	1 S	0714.6	0715.5	1.7	11	6		
	15000	KISV	45 C	0715.0	0715.5	1.0	10			
	9400	TYKW	5 S	0749.0	0754	10.0	4	2		
	2950	GORK	21 GRF	0824.5	0927.0	138.0E	8	4		
	810	KRAK	8 S	0832.0	0832.0	.1	20			
	3200	BERN	20 GRF	0919.2	0927.5	19.0	7.0			
	5200	BERN	20 GRF	0922.0	0928.9	14.0	16.0			
	3100	CRIM	20 GRF	0924.5	0928.0	10.0	5	3		
	930	BORD	41 F	0927.8	0927.8	.9	19	2		
	536	ONDR	4 S/F	0930.5	0931	1.0	49	2		
	810	KRAK	8 S	0933.0	0933.0	.1	14			
	9100	GORK	21 GRF	1050.3	1125.1	52.0D	10			
	5200	BERN	3 S	1050.7	1054.6	45.0	36.0			
	3200	BERN	3 S	1050.7	1055.8	45.0	32.0			
	8400	BERN	3 S	1050.8	1054.6	36.0	30.0			
	11800	BERN	3 S	1050.8	1055.2	30.0	15.0U			
	3000	POTS	4 S/F	1053.0	1055.8	4.0	39			
	6100	KISV	4 S/F	1053.0	1054.8	5.0	18			
	9500	POTS	3 S	1053.5	1054.6	3.5	16			
	950	GORK	1 S	1053.7	1055.0	7.6	3			
	2950	GORK	3 S	1053.8	1054.7	3.2	26	13		
	3100	CRIM	3 S	1053.8	1054.5	5.0	30	10		
	9100	GORK	1 S	1053.9	1054.7	3.4	23	10		
	650	GORK	1 S	1054.0	1055.6	2.6	4			
	2650	DWIN	2 S/F	1054.0	1056	4.0	40	20		
	1470	POTS	3 S	1054.0	1054.9	2.0	6.8			
	4995	ATHN	4 SF	1054.0	1055.0	4.5D	26			
	2695	ATHN	4 SF	1054.0	1055.3	5.0D	32			
	8800	ATHN	4 SF	1054.0	1055.0	4.5	25			
	29	UPIC	46 C	1054.5	1055.7	4.5				
	33	UPIC	46 C	1054.5	1055.6	4.0				
	430	KRAK	4 S/F	1055.2	1056.0	1.5	67	6		
	430	KRAK	1 S	1122.5	1122.7	.8	13	6		
	2800	OTTA	24 R	1250.0	1315	25.0	3.8	1.9		
	2800	OTTA	27AFRF	1250.0		440.0	3.8	3.6		
	2800	OTTA	24P R	1315.0		400.0	3.8			
	2800	OTTA	20 GRF	1325.0	1340	65.0	4.2			
	2800	OTTA	8 S	1441.7	1442	.6	6.4			
	3200	BERN	22 GRF	1603.2	1610.0	18.0	13.0			
	5200	BERN	22 GRF	1603.2	1610.2	18.0	28.0			
	2800	OTTA	20 GRF	1605.0	1610	20.0	10.8	2.8		
	9400	HUAN	S	1609.0	1635.5	35.3	8.7	3.1		0
	2800	OTTA	20 GRF	1627.0		60.0	2.4			
	9400	HUAN	S	1631.6	1633.2	3.4	19.2	11.4		0
	2800	OTTA	20 GRF	1750.0	1806	30.0	4.2	2.1		
	9400	HUAN	S	1807.3	1839.5	48.7	17.5	7.8		0
	15400	PALE	4 SF	1823.3	1823.8	2.8	55			
	4995	PALE	8 S	1823.3	1823.8	.8	15			
	8800	PALE	4 SF	1823.3	1823.8	2.2	53			

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					UT	UT	MINUTES	PEAK	MEAN		
29	9400	HUAN		S	1823.4	1823.8	2.0	28.4	21.0		R
	2800	OTTA	1	S	1949.0	1951	5.0	2.6	1.3		
	2800	OTTA	26	FAL	1955.0	2010	15.0	-3.8	-1.3		
	1000	TYKW	45	C	2256.0	2256.8	1.5	17	5		
	2000	TYKW	5	S	2256.5	2256.8	.5	5	1		
	2695	PENT	2	S/F	2256.5	2257	1.0	5.4			
	3750	TYKW	28	PRE	2304.0	2307	9.0	3.5	2		
	9400	TYKW	28	PRE	2304.0	2306.8	10.0	15	6		
	245	LEAR	8	S	2304.6	2304.8	.2	15			
	410	LEAR	8	S	2304.6	2304.8	.2	09			
	2000	TYKW	28	PRE	2310.0	2320	10.0	2	1		
	3750	TYKW	45	C	2313.0	2315.0	10.0	42	8		
	9400	TYKW	45	C	2314.0	2315.0	10.0	63	15		
	8800	LEAR	8	S	2314.8	2315.0	.3	61			
	15400	LEAR	8	S	2314.8	2314.8	.3	20			
	4995	LEAR	8	S	2314.8	2315.1	.3	110			
	15400	LEAR	8	S	2314.8	2314.8	.3	20			
	2695	PENT	3	S	2320.0	2321.2	2.5	22.0	8.0		
	1000	TYKW	45	C	2320.0	2320.8	3.0	14	4		
	2000	TYKW	5	S	2320.0	2321.2	3.0	14	5		
	606	LEAR	8	S	2320.1	2321.6	1.5	139			
	245	LEAR	47	GB	2320.3	2320.5	.3	520			
	4995	LEAR	8	S	2320.3	2321.1	1.2	25			
	1415	LEAR	8	S	2320.3	2321.1	1.5	15			
	2695	LEAR	8	S	2320.6	2321.1	.7	17			
	2000	TYKW	29	PBI	2323.0		13.0	2	1		
	3750	TYKW	29	PBI	2323.0		15.0	5	2.5		
	9400	TYKW	30	PBI	2324.0		25.0	13	5		
	9400	TYKW	5	S	2334.0	2336	10.0	5	2.5		
	3750	TYKW	28	PRE	2350.0	2350.6	17.0	3	2		
	9400	TYKW	5	S	2350.0	0000	12.0	3	1.5		
	2000	TYKW	28	PRE	2350.6	0009	19.0	6	2		
30	245	LEAR	43	NS	0426.8	0723.1	271.2	119			
	260	ONDR	44	NS	0700.0E		430.0D	64			
	9400	TYKW	31	ABS	0002.0	0010	10.0	-3	-1.5		
	2930	VORO	42	SER	0005.0	0023	85.0	313 D			
	2695	PENT	46F	C	0006.0	0023	72.0	435.0	188.0		
	3750	TYKW	45	C	0007.0	0023.0	78.0	330	125		
	2000	TYKW	45	C	0009.0	0023.1	78.0	380	135		
	1000	TYKW			0009.0	0023.4		133			
	1000	TYKW	45	C	0009.0	0043.9	78.0	139	65		
	2695	MANI	47	GB	0009.0	0023.1	78.0D	460			
	1415	MANI	47	GB	0009.0	0023.5	77.0D	240			
	606	MANI	47	GB	0009.5	0020.1	78.5D	48			
	208	VORO	23	GRF	0010.0	0018	32.0	68			
	4995	MANI	47	GB	0010.5	0023.1	68.5D	230			
	1415	PALE	47	GB	0010.8	0023.1	89.0	240			
	2695	PALE	47	GB	0011.0	0023.0	88.5	410			
	9400	TYKW	45	C	0012.0	0050	78.0	115	62		
	8800	MANI	47	GB	0013.0	0023.8	65.0	130			
	606	PALE	47	GB	0013.6	0019.8	69.5	61			
	4995	PALE	47	GB	0014.8	0022.8	85.5	230			
	8800	PALE	47	GB	0016.6	0050.3	83.2	139			
	17000	NOBE	20	GRF	0017.9	0049.3	72.0	50			0
	35000	NAGO	20	GRF	0020.0	0103	185.0	60			
	15400	PALE	47	GB	0040.3	0050.3	29.3	54			
	245	PALE	47	GB	0040.6	0042.8	.2	24			
	2695	PENT	29	PBI	0118.0	0118	20.0D	50.0			
	3750	TYKW	30	PBI	0125.0		400.0	50	25		
	2000	TYKW	30	PBI	0127.0		400.0	37	18		
	1000	TYKW	30	PBI	0127.0		400.0	16	8		
	1000	TYKW	31	ABS	0130.0	0150	65.0	-7	-4		
	9400	TYKW	30	PBI	0130.0		400.0	37	18		
	2000	TYKW	31	ABS	0131.0	0145	60.0	-5	-3		
	3750	TYKW	20	GRF	0150.0	0200	60.0	4	2		
	9400	TYKW	21	GRF	0150.0	0200	55.0	5	3		
	9400	TYKW	5	S	0209.0	0213	21.0	5	2.5		
	17000	NOBE	1	S	0217.7	0218.4	3.0	11			0
	9400	TYKW	5	S	0239.0	0239.7	3.0	3	1		
	9400	TYKW	5	S	0259.0	0300	4.0	3	1		
	9400	TYKW	45	C	0307.0E	0313.0	17.0D	14	6 D		
	15400	LEAR	8	S	0312.1	0313.1	1.9	31			
	8800	LEAR	8	S	0312.3	0313.1	1.2	23			
	3750	TYKW	5	S	0327.0	0330	6.0	5.5	3.5		
	3750	TYKW	30	PBI	0333.0		80.0	3	2		
	9400	TYKW	5	S	0337.0	0338.4	3.0	7	4		
	9400	TYKW	29	PBI	0340.0		10.0	3	1.5		
	9400	TYKW	21	GRF	0350.0	0426	70.0	11	4		
	9400	TYKW	45	C	0355.0	0358.8	7.0	25	10		
	17000	NOBE	1	S	0357.7	0358.8	3.0	22			0
	9400	TYKW	29	PBI	0402.0		10.0	9	4		
	3750	TYKW	5	S	0422.0	0425.7	20.0	5	2		
	9400	TYKW	5	S	0436.0	0436.9	5.0	7	2		
	9400	TYKW	28	PRE	0515.0	0534	25.0	8	3		

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30	2950	GORK	2Ø GRF	Ø532.ØE	Ø536.Ø	33.ØD	12	6		
	9100	GORK	23 GRF	Ø533.ØE	Ø544.1	240.ØD	36			
	3750	TYKW	45 C	Ø533.Ø	Ø536.5	2Ø.Ø	2.5	1		
	9400	TYKW	45 C	Ø540.Ø	Ø544.2	23.Ø	24	11		
	15400	LEAR	4 SF	Ø541.6	Ø544.6	3.5	29			
	8800	LEAR	4 SF	Ø542.1	Ø544.1	4.5	27			
	9100	GORK	1 S	Ø559.2	Ø7ØØ.2	2.6	9	4.5		
	9400	TYKW	29 PBI	Ø6Ø3.Ø		27.Ø	9	4		
	9500	POTS	1 S	Ø653.Ø	Ø654.5	3.Ø	1Ø			
	9400	TYKW	5 S	Ø653.5	Ø654.6	1Ø.Ø	9	2.5		
	3000	POTS	4Ø F	Ø655.Ø	Ø657	2Ø.Ø	19			
	9400	TYKW	2Ø GRF	Ø715.Ø	Ø73Ø	4Ø.Ø	1Ø	5		
	430	KRAK	8 S	Ø719.5	Ø719.5	.1	32			
	3750	TYKW	2Ø GRF	Ø72Ø.Ø	Ø735	4Ø.Ø	3	1.5		
	234	POTS	41 F	Ø723.Ø	Ø723.9	.9	15Ø	3		
	606	LEAR	8 S	Ø847.8	Ø847.8	.3	55			
	9500	POTS	25 R	Ø853.Ø	Ø853.5	25.Ø	6			
	2950	GORK	2Ø GRF	Ø9Ø2.Ø	Ø9Ø6.Ø	12.5	3	1.5		
	3100	CRIM	2Ø GRF	Ø9Ø3.Ø	Ø9Ø8.Ø	12.Ø	3	1		
	9500	POTS	8 S	Ø951.Ø	Ø951.2	.5	2Ø			
	9100	GORK	22 GRF	1ØØ3.8	1Ø13.8	146.ØE	15			
	9500	POTS	2Ø GRF	1Ø1Ø.Ø	1Ø12.5	9.Ø	13			
	9500	POTS	2Ø GRF	1Ø21.Ø	1Ø22.5	6.5	7			
	9500	POTS	25 R	1102.Ø	1102.5	8.Ø	9			
	9500	POTS	2Ø GRF	1135.Ø	1138	15.Ø	9			
	2950	GORK	1 S	1136.Ø	1137.Ø	2.Ø	5	2.5		
	2950	GORK	2Ø GRF	1148.Ø	123Ø.Ø	1Ø6.ØE	1Ø	5		
	9500	POTS	25 R	1201.Ø	1204.6	29.Ø	11			
	9400	HUAN	S	1203.5	1204.8	3.5	14.Ø	6.7		Ø
	536	ONDR	8 S	1209.Ø	1209	.4	55			
	2800	OTTA	24 R	1220.Ø	123Ø	1Ø.Ø	4.2			
	2800	OTTA	27A RF	1220.Ø		355.Ø	4.2	4.Ø		
	2800	OTTA	24P R	1230.Ø		33Ø.Ø	4.2			
	2800	OTTA	2Ø GRF	1430.Ø	15ØØ	7Ø.Ø	4.2	3.3		
	93Ø	BORD	41 F	1533.4	1533.7	.3	17	2		
	2800	OTTA	26 FAL	18ØØ.Ø	1815	15.Ø	-4.2	-2.1		
	245	PALE	8 S	1802.3	1802.6	.3	34			
	9400	HUAN	S	1917.6	1940.3	28.Ø	7.Ø	2.9		Ø
	2800	OTTA	2Ø GRF	1945.Ø	2Ø3Ø	1Ø5.Ø	3.8	1.9		
	9400	HUAN	S	2Ø31.3	2Ø32.Ø	2.6	15.7	7.7		L
	3750	TYKW	21 GRF	2205.Ø	2207.5	35.Ø	3	1		
	3750	TYKW	5 S	2226.Ø	2226.4	1.Ø	13	3		
	2000	TYKW	5 S	2226.Ø	2226.4	1.Ø	4	1		
	2800	OTTA	8 S	2226.Ø	2226.2	.5	7.2	3.6		
	17000	NOBE	2Ø GRF	2258.6	23Ø1.4	2Ø.Ø	34			Ø
	9400	TYKW	45 C	2259.Ø	23Ø1	2Ø.Ø	12	6		RAIN
	15400	PALE	4 SF	23ØØ.8	23Ø2.3	2.8	33			
	8800	PALE	4 SF	23Ø1.1	23Ø2.5	2.5	34			
	3750	TYKW	21 GRF	23Ø5.Ø	2330	5Ø.Ø	2.5	1		
	3750	TYKW	5 S	2314.5	2315.2	1.5	2	.5		
	245	LEAR	8 S	2337.5	2337.8	.6	11			
31	9400	TYKW	5 S	ØØ42.Ø	ØØ43.6	1Ø.Ø	9	3		RAIN
	3750	TYKW	21 GRF	Ø12Ø.Ø	Ø545	4ØØ.Ø	2Ø	8		
	3750	TYKW	5 S	Ø124.Ø	Ø127	8.Ø	2	1		
	2000	TYKW	2Ø GRF	Ø13Ø.Ø	9540	36Ø.Ø	8	4		
	9400	TYKW	21 GRF	Ø15Ø.Ø	Ø535	35Ø.Ø	2Ø U	1Ø U		RAIN
	245	LEAR	4 SF	Ø152.Ø	Ø152.3	3.Ø	15			
	9400	TYKW	5 S	Ø153.Ø	Ø153.6	1.Ø	9	3		
	9400	TYKW	45 C	Ø2Ø3.Ø	Ø2Ø3.9	15.Ø	8	2.5		
	17000	NOBE	1 S	Ø2Ø3.3	Ø2Ø3.8	1.Ø	11			Ø
	9400	TYKW	45 C	Ø22Ø.Ø	Ø222	15.Ø	7	2.5		
	3750	TYKW	45 C	Ø223.5	Ø224.1	1Ø.Ø	3	1		
	1000	TYKW	45 C	Ø229.Ø	Ø229.4	1.5	12	4		
	3750	TYKW	45 C	Ø326.Ø	Ø4Ø7.2	9Ø.Ø	9	4		
	15400	PALE	4 SF	Ø4Ø7.1	Ø4Ø9.Ø	3.5	76			
	1000	TYKW	8 S	Ø416.Ø	Ø416.1	.2	14	4		
	1000	TYKW	45 C	Ø433.Ø	Ø433.6	2.5	2Ø	1		
	410	LEAR	4 SF	Ø436.3	Ø438.Ø	2.3	33			
	9400	TYKW	45 C	Ø441.5	Ø443.3	12.Ø	27	7		
	8800	LEAR	4 SF	Ø442.8	Ø443.3	5.3	31			
	15400	LEAR	4 SF	Ø442.8	Ø443.3	5.3	Ø9			
	9100	GORK	23 GRF	Ø533.ØE	Ø64Ø.8	13Ø.ØD	27			
	2950	GORK	2Ø GRF	Ø533.ØE	Ø545.Ø	117.ØD	12	6		
	9400	TYKW	28 PRE	Ø617.Ø	Ø619.1	15.Ø	9	4		
	9100	GORK	1 S	Ø618.3	Ø619.2	2.7	11	5		
	9400	TYKW	45 C	Ø632.Ø	Ø641.Ø	18.Ø	27	9		
	8800	LEAR	4 SF	Ø634.3	Ø64Ø.8	7.8	21			
	15400	LEAR	4 SF	Ø64Ø.5	Ø64Ø.8	3.5	18			
	9400	TYKW	3Ø PBI	Ø65Ø.Ø		3Ø.Ø	4	2		
	9400	TYKW	45 C	Ø652.Ø	Ø654.Ø	8.Ø	17	7		
	9100	GORK	2 S/F	Ø652.4	Ø653.5	3.6	16	8		
	8800	LEAR	4 SF	Ø653.Ø	Ø654.Ø	3.5	27			
	15400	LEAR	4 SF	Ø653.Ø	Ø654.Ø	3.5	Ø1			
	2950	GORK	2Ø GRF	Ø759.Ø	Ø93Ø.Ø	155.Ø	5	2.5		

SOLAR RADIO EMISSION
OUTSTANDING OCCURRENCES

MARCH 1981

DAY OF MONTH	FREQUENCY	STATION	TYPE	STARTING TIME UT	TIME OF MAXIMUM UT	DURATION MINUTES	FLUX DENSITY 10^{-22} Wm^{-2} Hz^{-1} PEAK	FLUX DENSITY MEAN	INT	POLARIZATION OR REMARKS
31	3100	CRIM	20 GRF	0800.0	0812.0	24.0	3	1		
	1415	LEAR	8 S	0834.6	0834.8	.2	20			
	260	ONDR	42 SER	0851.0	0906.6	43.0	15			
	9100	GORK	22 GRF	0918.8	0957.2	50.0	16			
	9500	POTS	29 PBI	0955.0	0956	25.0	10			
┌	2950	GORK	20 GRF	1044.0	1230.0	106.0E	10	5		
├	3100	CRIM	20 GRF	1054.0	1112.0	74.0	7	2		
└	9100	GORK	20 GRF	1055.0	1222.0	95.0E	13			
	536	ONDR	8 S	1143.0	1143	.2	34			
	260	ONDR	8 S	1143.2	1143.2	.2	27			
	2800	OTTA	240 R	1215.0	1223	8.0	3.2	1.6		
	3100	CRIM	20 GRF	1221.5	1230.0	22.0	4	1		
┌	9400	HUAN	8 S	1301.0	1302.0	3.4	41.7	18.0		0
├	9500	POTS	29 PBI	1301.4	1301.6	14.0	34			
├	8800	ATHN	8 S	1301.5	1301.8	.5	36			
├	4995	ATHN	8 S	1301.6	1302.0	.7D	08			
├	15400	SGMR	8 S	1301.6	1301.8	.9	64			
├	2695	ATHN	8 S	1301.6	1302.1	.7D	04			
└	2800	OTTA	8 S	1301.8	1302	.3	2.8			
	9500	POTS	29 PBI	1320.0	1320.5	5.0	5			
┌	2800	OTTA	22 GRF	1335.0	1420	265.0	11.6	5.8		
└	9500	POTS	20 GRF	1417.0	1420	23.0	7			
	2800	OTTA	20 GRF	2020.0	2030	20.0	2.8	1.7		
	245	PALE	47 GB	2032.6	2035.3	3.0	220			
	245	PALE	8 S	2042.3	2043.6	2.0	210			
	2800	OTTA	26A FAL	2050.0	2145	55.0	-7.4	-4.0		
	245	PALE	8 S	2050.8	2051.0	.3	52			
	410	PALE	8 S	2129.1E	2129.3	.9D	100			
┌	1000	TYKW	42 SER	2135.0	2135.3	2.0	165	10		
├	2000	TYKW	45 C	2135.0	2136.0	2.5	8	2.5		
├	3750	TYKW	45 C	2135.5	2136.0	1.5	3.5	1.5		
└	2800	OTTA	1 S	2135.7	2136	1.3	4.2	2.0		
	1000	TYKW	8 S	2144.1	2144.2	.2	11	4		
┌	2695	PENT	20 GRF	2150.0	2230	90.0	5.2	2.6		
├	3750	TYKW	20 GRF	2200.0	2230	90.0	8	4		
└	9400	TYKW	20 GRF	2220.0	2245	60.0	4	2		
	410	MANI	8 S	2353.1	2353.8	1.9	130			

Reports are received routinely from the following observatories:

ABST = Abastumania
ATHN = Athens
BERN = Berne
BORD = Bordeaux
CRIM = Crimea
DWIN = Dwingeloo
GORK = Gorky
HARS = Harestua
HIRA = Hiraiso
HUAN = Huancayo
IRKU = Irkutsk
IZMI = Izmiran
KISV = Kislovodsk
KRAK = Krakow
LEAR = Learmonth
MANI = Manila
NAGO = Nagoya
NOBE = Nobeyama
ONDR = Ondrejov
OTTA = Ottawa
PALE = Palehua
PENT = Penticton
POTS = Potsdam
SAOP = Sao Paulo
SGMR = Sagamore Hill
SYDN = Sydney
TORN = Torun
TYKW = Toyokawa
TRST = Trieste
UPIC = Upice
VORO = Voroshilov

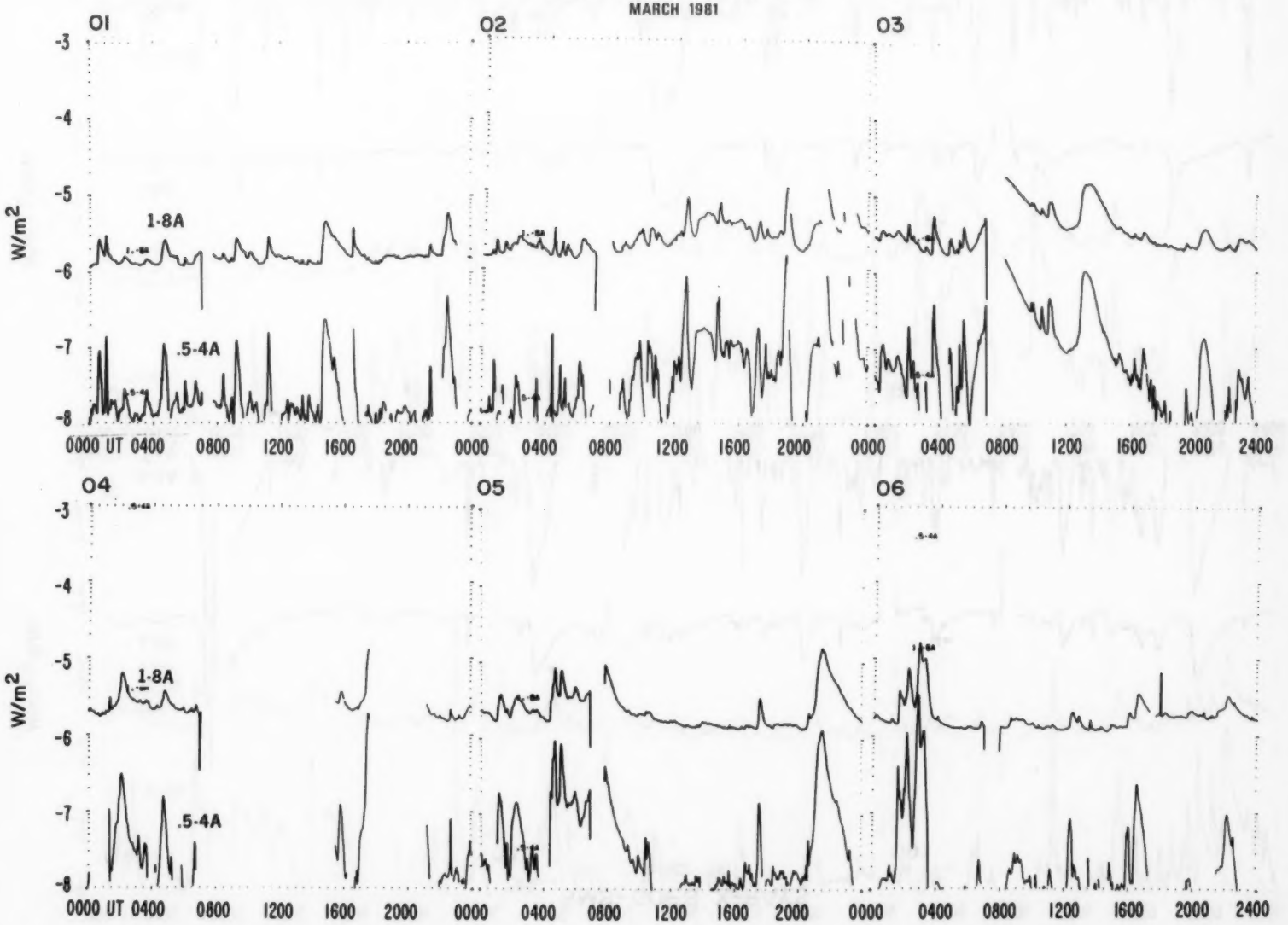
Explanation of Type Code:

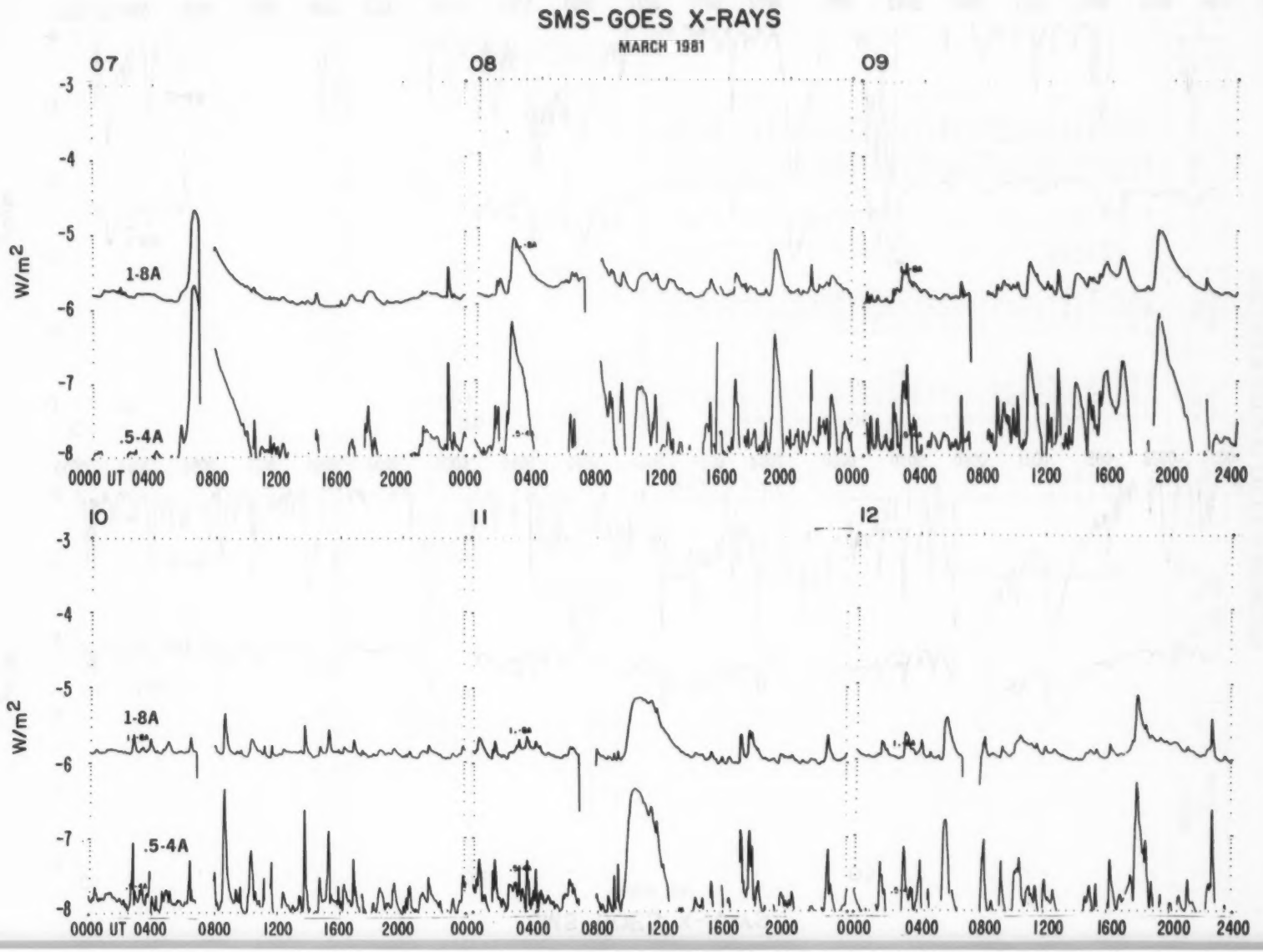
1 Simple 1
2 Simple 1F
3 Simple 2
4 Simple 2F
5 Simple
6 Minor
7 Minor +
8 Spike
20 Simple 3
21 Simple 3A
22 Simple 3F
23 Simple 3AF
24 Rise
25 Rise A
26 Fall
27 Rise and Fall
28 Precursor
29 Post Burst Increase
30 Post Burst Increase A
31 Post Burst Decrease
32 Absorption
40 Fluctuation
41 Group of Bursts
42 Series of Bursts
43 Onset of Noise Storm
44 Noise Storm in Progress
45 Complex
46 Complex F
47 Great Burst
48 Major
49 Major +

1A Simple 1A
2A Simple 1AF
3A Simple 2A
4A Simple 2AF
21A Simple 3A GRF
240 Rise only
240F Rise only F
24P Post Rise
24PF Post Rise F
26A Fall A
260 Fall Only
26F Fall F
27F Rise and Fall F
27AF Rise and Fall AF
31A P.B. Decrease A
32A Absorption A
46F Complex F

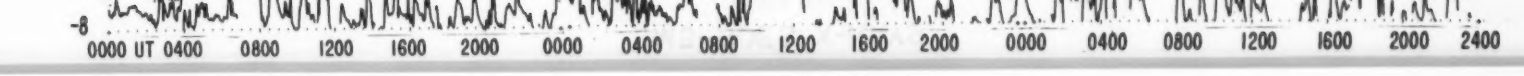
SMS-GOES X-RAYS

MARCH 1981



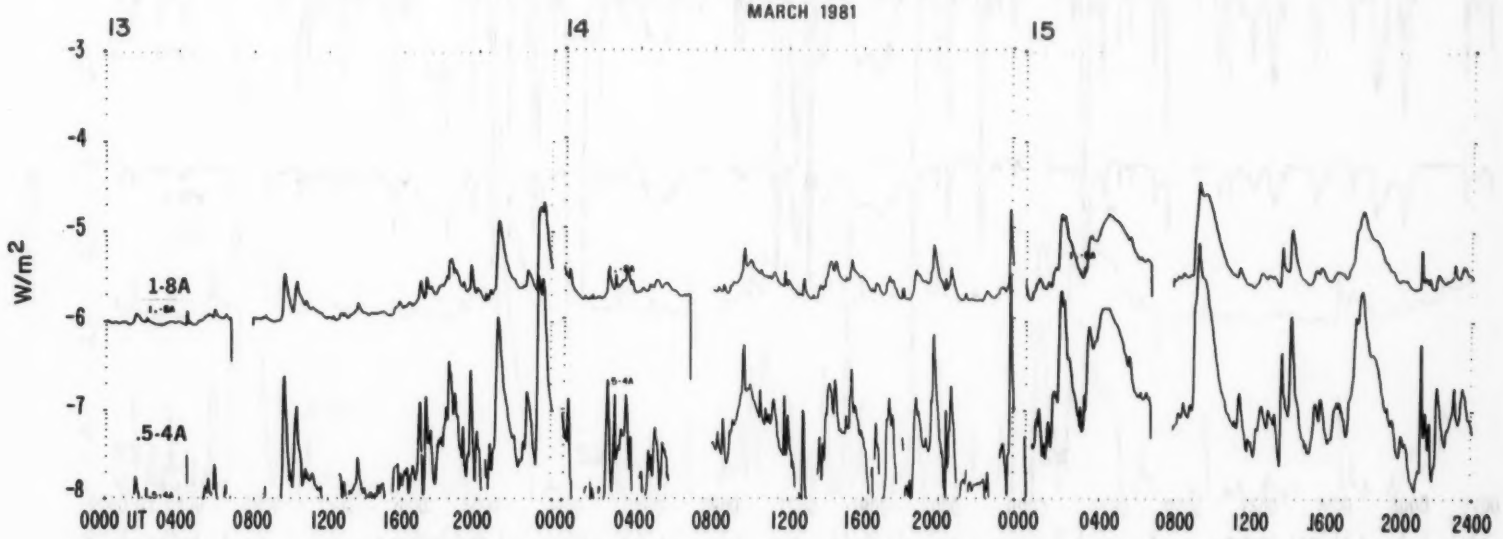


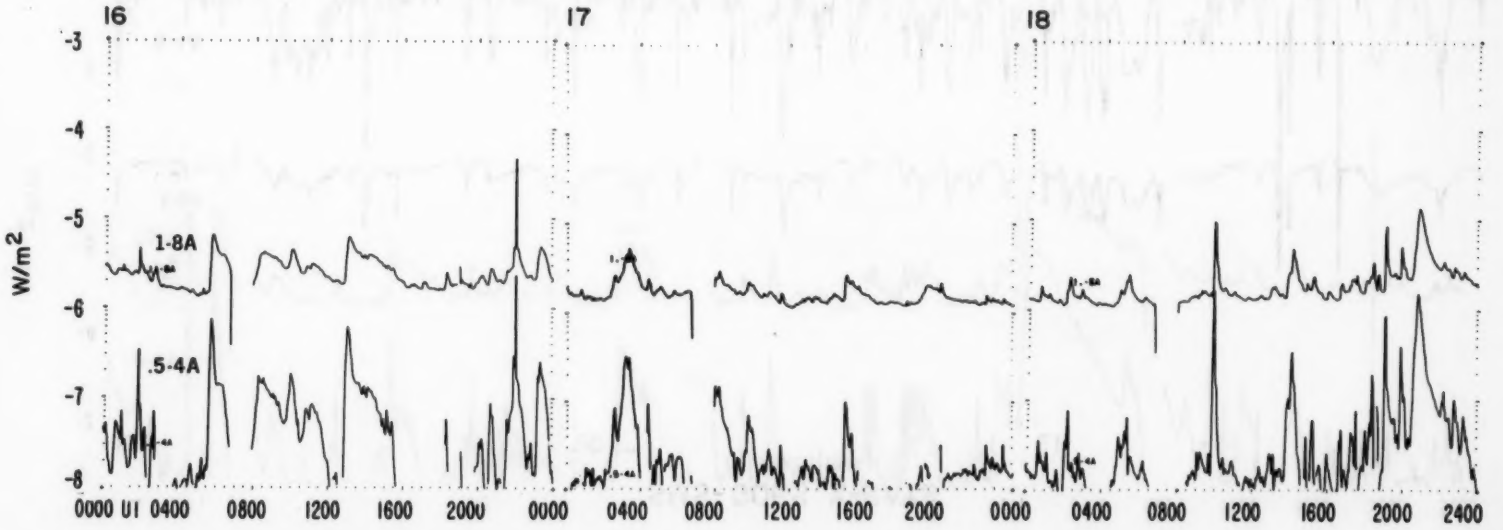
SMS-GOES X-RAYS
MARCH 1981



SMS-GOES X-RAYS

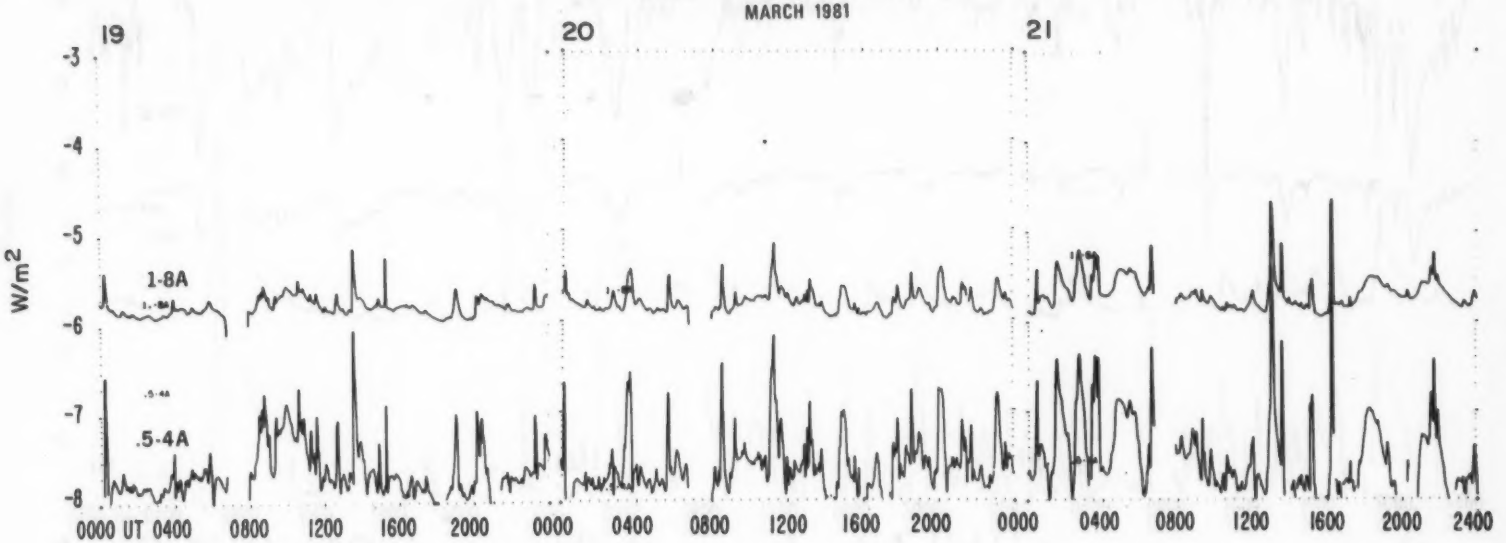
MARCH 1981

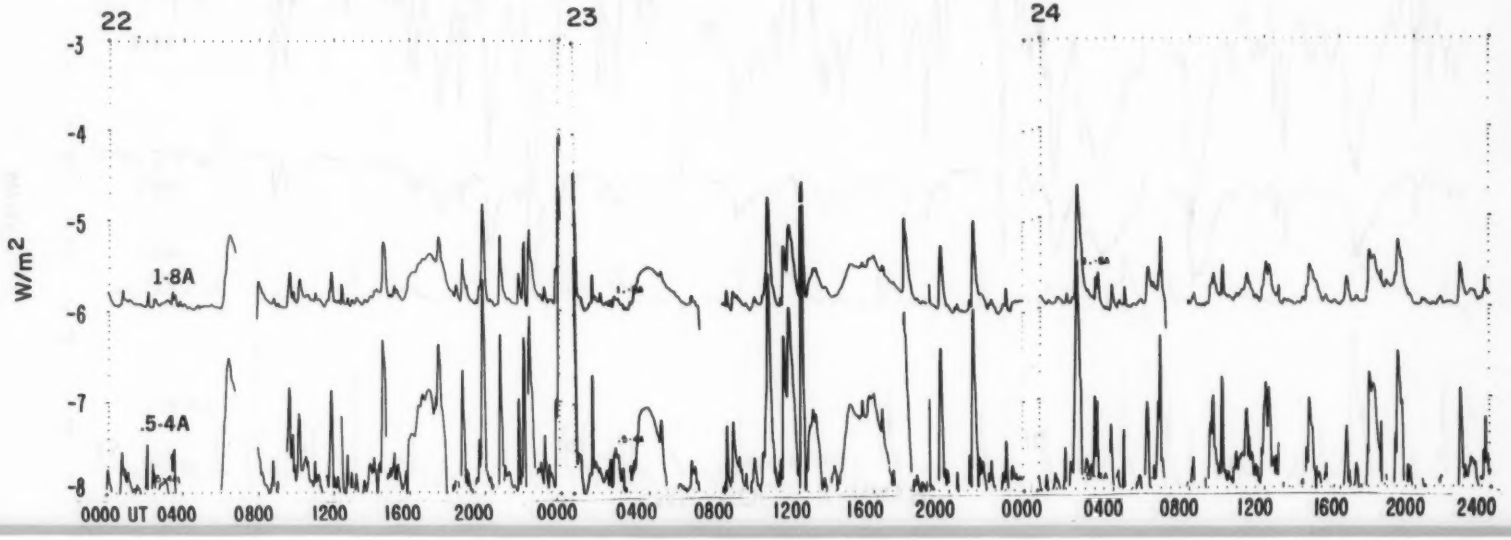




SMS-GOES X-RAYS

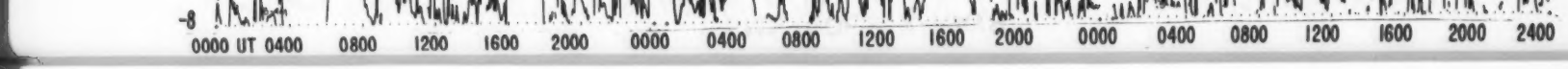
MARCH 1981





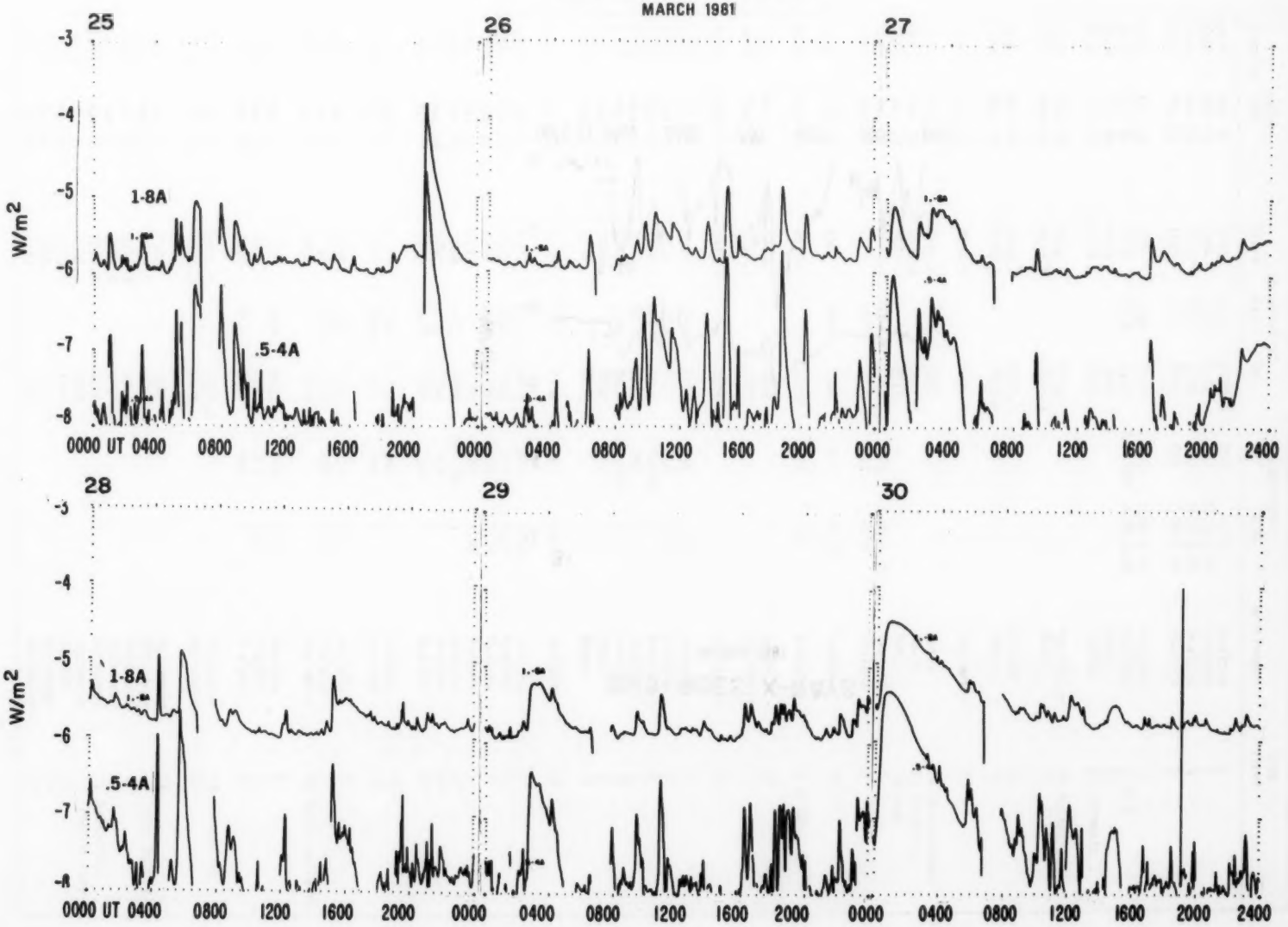
SMS-GOES X-RAYS

MARCH 1981



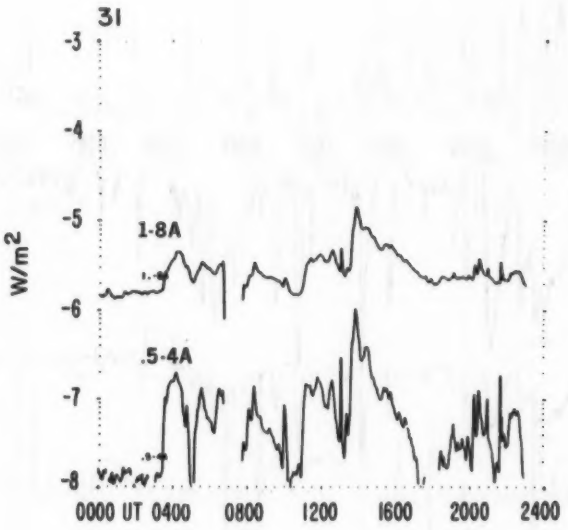
SMS-GOES X-RAYS

MARCH 1981



SMS-GOES X-RAYS

MARCH 1981



MASS EJECTIONS FROM THE SUN

MARCH 1981

Station	Date 1981	Observed UT Start	Max	End	Location RA°	R/R_o	Wavelength	Type Event
KHAR	Mar 01	0912	0912	0919	099	0.76	H-alpha	S
KHAR	Mar 01	1104	1105	1122	097	1.00-1.02	H-alpha	S
KHAR	Mar 01	1113	1113	1125	082	1.00-1.02	H-alpha	S
KHAR	Mar 01	1113	1114	1142	286	1.00-1.02	H-alpha	S
KHAR	Mar 02	1037	1053	1130	057	1.00-1.02	H-alpha	S
KHAR	Mar 02	1050	1055	1132	230-209	0.20-0.30	H-alpha	S or Q
HARV	Mar 02	1458		1513			Meter	II
WEIS	Mar 02	1458		1510			35-80	II Harmonic
DWIN	Mar 03	0651		0750			Decimeter	IV Pulsations
LEAR	Mar 03	0810.5		0815.4			Meter	II
WEIS	Mar 04	0810.3		0813.5			100-140	II
LEAR	Mar 04	0810.5		0815.4			Meter	II
DWIN	Mar 05	0634.5		0636.4			Decimeter	IV
CULG	Mar 07	0622.5		0647			Meter	II Herringbone
WEIS	Mar 07	0630.8		0646.1			30-75	II Harmonic
CULG	Mar 07	0640		0715			Meter	IV Weak
KHAR	Mar 07	0855	0858	1010	260	1.00-1.03	H-alpha	S
KHAR	Mar 07	1018	1020	1029	261	0.93	H-alpha	S
BIGB	Mar 08	1822	1824	1838	073	0.714	H-alpha	SP
WEND	Mar 09	1334E		1549D	261	1.0	H-alpha	A or SP
CULG	Mar 10	0549		0558			Meter	II
DWIN	Mar 10	1011.5		1014.1			Decimeter	IV
DWIN	Mar 11	0948		1005			Decimeter	IV
KHAR	Mar 12	1206	1209	1218	351	0.45	H-alpha	S
KHAR	Mar 12	1212	1216	1224	308	0.33	H-alpha	S
BIGB	Mar 12	1737	1752	1817	072-080	1	H-alpha	A
BIGB	Mar 12	2205	2211	2221	086	1	H-alpha	A
BIGB	Mar 12	2242	2246	2308	070-080	1	H-alpha	SP
HARV	Mar 12	2244		2256			Meter	II
CULG	Mar 12	2245		2257			Meter	II
BIGB	Mar 13	1650	1653	1706	261	0.928	H-alpha	SP
KHAR	Mar 14	0902	0905	0914	286	1.00	H-alpha	S
KHAR	Mar 14	0928	0930	0952	268	1.00	H-alpha	S
KHAR	Mar 14	0950	0954	1009	258	1.00	H-alpha	S
KHAR	Mar 14	1145		1148	268	1.00	H-alpha	S
BIGB	Mar 14	1628	1632	1652	260-266	1	H-alpha	SP
BIGB	Mar 14	1712	1717	1748	259	1	H-alpha	SP
BIGB	Mar 14	1910	1939	1949	260	1	H-alpha	SP
BIGB	Mar 15	1700	1705	1725	260	1	H-alpha	SP
BIGB	Mar 15	1829	1839	1857	260	1	H-alpha	SP
KHAR	Mar 17	1135	1138	1152	317	0.5	H-alpha	S
KHAR	Mar 17	1153	1153	1157	068	0.42	H-alpha	S
DWIN	Mar 17	1458		1504			Decimeter	IV Zebra patterns
KHAR	Mar 18	0834	0838	0935	079	1.00	H-alpha	S
KHAR	Mar 18	0954		0958	066	0.47	H-alpha	S
BIGB	Mar 18	2050	2111	2257	066	1	H-alpha	SP
DWIN	Mar 20	0907.0		0910.5			Decimeter	IV Pulsations
DWIN	Mar 20	1521.1		1526.0			Decimeter	IV
DWIN	Mar 21	0647		0653			Decimeter	IV
DWIN	Mar 21	0719.7		0735.0			Decimeter	IV Fiber bursts
DWIN	Mar 21	0940.8		0950.9			Decimeter	IV
DWIN	Mar 21	1155.4		1157.6			Decimeter	IV
DWIN	Mar 21	1217.5		1219.6			Decimeter	IV Pulsations
DWIN	Mar 21	1256.3		1256.7			Decimeter	IV Fiber bursts
WEIS	Mar 21	1338.6		1341.1			100-280	II
DWIN	Mar 21	1455.5		1455.7			Decimeter	IV
HARV	Mar 21	1741		1800			Decimeter	IV

MASS EJECTIONS FROM THE SUN

MARCH 1981

Station	Date 1981	Observed UT Start	Max	End	Location RA°	R/R_0	Wavelength	Type Event
DWIN	Mar 22	0636.1		0638.1			Decimeter	IV Fiber bursts
WEND	Mar 22	0700E		0724	107	1.0-1.30	H-alpha	Q or SP
KHAR	Mar 22	0936	0937	0940	292	0.70	H-alpha	S
KHAR	Mar 22	0941	0952	1000	292	0.70	H-alpha	S
DWIN	Mar 22	1647.5		1650.5			Decimeter	IV
HARV	Mar 22	1650		1704			Decimeter; meter	IV Intermittent
CULG	Mar 22	2355.5		2400			Meter	II
HARV	Mar 22	2356		2405			Meter	II
CULG	Mar 23	0000		0007			Meter	II
WEIS	Mar 23	0705.9		0710.3			40-150	II Harmonic
CULG	Mar 23	0706		0726			Meter	II
WEIS	Mar 23	0728.5		0734.5			30-46	II
DWIN	Mar 23	1108.2		1110.5			Decimeter	IV Pulsations
WEIS	Mar 23	1112.8		1116.6			30-86	II Herringbone
DWIN	Mar 23	1203		1210			Decimeter	IV
KHAR	Mar 24	0939		0943	283	0.90	H-alpha	S
BIGB	Mar 25	1651	1700	1710	102	1	H-alpha	SP
HARV	Mar 25	2042		2104			Meter	II
CULG	Mar 25	2042.5		2107			Decimeter; meter	II Herringbone
BIGB	Mar 25	2046	2110	2250	279	1	H-alpha	SP
CULG	Mar 25	2050		2210			Meter	IV
HARV	Mar 26	1802		1806			Meter; dekameter	II Large group
WEND	Mar 27	0818E	0823	0843D	066	1.0	H-alpha	A
HARV	Mar 27	2216		2300			Decimeter; meter	IV
CULG	Mar 28	0418.5		0421			Meter	Possible II
WEND	Mar 28	0845E		1019D	090	1.0	H-alpha	A
WEND	Mar 28	1410E	1513	1600D	077	1.0-1.24	H-alpha	Q
BIGB	Mar 30	1824	1829	1919	280	1	H-alpha	SP
BIGB	Mar 30	2138	2152	2205	279	1	H-alpha	SP
KHAR	Mar 31	0910	0910	0935	077	1.00	H-alpha	S
BIGB	Mar 31	2320	2341	0004	090	1	H-alpha	A

QUALIFIERS ON START, MAX AND END TIMES
D = event ended after the tabulated time
E = event began before the tabulated time
U = uncertain time

TYPE OF EVENT
A = eruptive active region prominence
CB = coronal cloud bubble
D = coronal depletions
E = coronal enhancement
EL = coronal expanding loop
II = Type II radio burst
IVm = moving Type IV radio burst
Q = eruptive quiescent prominence
R = coronal ray or streamer
S = flare-surge if there is a known flare association
SP = flare-spray if there is a known flare association
* = movement may be caused by ionospheric refraction

REPORTING STATIONS
BIGB = Big Bear
BLEN = Bleien
CULG = Culgoora
DWIN = Dwingeloo
GEOR = Georgiana
HALE = Haleakala
HAOC = High Altitude Observatory's SMM Coronagraph/Polarimeter
HAOK = High Altitude Observatory's MARK-III Coronameter at Mauna Loa
HARV = Harvard (Fort Davis)
KHAR = Kharkov
LEAR = Learmonth
MANI = Manila
MITK = Mitaka
NRLC = Naval Research Laboratory's White-Light Coronagraph Experiment on P78-1
PALE = Palehua
SGMR = Sagamore Hill
TELV = Tel Aviv
WEIS = Weissenau
WEND = Wendelstein
UDAI = Udaipur

NOTE: Because only a small fraction of the data taken by satellite-borne coronagraph had been analyzed at the time this table was assembled, many events are defined solely by ground-based observatory reports.

SGD 445 Part II (Comprehensive)

JANUARY 1980 DATA

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Hα SOLAR FLARES

JANUARY 1980

OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS.		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX LONG. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONF.	TYPE	TIME UT	MEAS AREA Millionths of Disk	CORR AREA Sq. Deg.		
940 VORO	01	0218	0220	0221	N15	E68	.938	16566	6.2	3	-F		C	0220	63		D	ZX
941 YUNN	01	0421E	0421	0441	S11	E32	.541	16558	3.6	200	-N		C		161	1.9		ZX
942 YUNN	01	0600	0605	0615	N10	E73	.960	16566	6.7	15	?F		C		80			ZX
	IMP. 1 NO : CULG																	
943 KANZ	01	1144	1148	1230	S22	E06	.340	16555	1.9	46	-N	2					U	ZX
944 KANZ	01	1208	1215	1222	N12	E73	.962	16572	7.0	14	-F	1						ZX
945 KANZ	01	1222	1230	1237	S14	W90	1.000	16539	25.8	15	-F	1						ZX
	01	1400	1447	NO FLARE PATROL														
GRP80946	01	1747+5	1813+1	1853	N13	E60	.880	16566	6.2	66	1N				200	4.2	U	
RAMY	01	1747	1814	1852	N13	E59	.872	16566	6.2	65	1N	3	C		198		U F	
BIGB	01	1752	1813	1854	N13	E64	.910	16566	6.5	62	1B		C	1813	210	4.9		
HUAN	01	1821E		1845D	N14	E60	.882	16566	6.3	240	-F	1	P				E	
947 RAMY	01	1833	1840	1848	S21	E02	.311	16555	1.9	9	-F	3	C		32			ZX
948 BIGB	01	2054	2100	2130	S14	E27	.482	16558	3.9	36	-B		C	2100	180	2.1		ZX
949 CULG	01	2257	2301	2320	N18	E48	.785	16571	5.6	23	-N		C	2301	40	.6		ZX
950 CULG	01	2327	2329	2348	S14	W38	.630	16548	30.1	21	-F		C	2329	40	.5	K	ZX
951 CULG	02	0114	0122	0126	S14	E13	.289	16558	3.0	14	-F		C	0122	40	.4		ZX
GRP80952	02	0126+2	0130+2	0150:	S24	W04	.362	16555	1.8	24	1N						FI	
CULG	02	0126	0132	0230	S25	W04	.378	16555	1.8	64	2N		C	0132	1000	11.0	FI	
YUNN	02	0128	0133	0150	S24	W04	.362	16555	1.8	22	1N		C		385	4.1	E	
PALE	02	0128E		0140D	S21	W04	.314	16555	1.8	120	-N	1	C		50		F	
GRP80953	02	0311+1	0315+2	0336	S14	W34	.578	16548	30.6	25	1F				190	2.3		
CULG	02	0311	0317	0342D	S15	W35	.594	16548	30.5	310	1F		C	0317	230	2.9	F	
YUNN	02	0312	0315	0330	S14	W34	.578	16548	30.6	18	-F		C		145	1.8	E	
954 CULG	02	0330	0354	0430D	N12	E56	.845	16566	6.3	600	?F		C	0354	260	4.7		ZX
	IMP. 1 NO : YUNN																	
955 CULG	02	0350	0359	0405	S10	E20	.359	16558	3.7	15	-N		C	0359	100	1.1	F	ZX
956 YUNN	02	0521E	0521	0524	S15	E10	.266	16558	3.0	30	-N		C		145	1.5		ZX
957 YUNN	02	0553	0555	0626	S14	E18	.356	16558	3.6	33	-N		C		48	.5		ZX
958 CATA	02	0735E	0745	0755D	S25	W53	.823	16547	29.3	200	-N	2	P	0745	28	.5		ZX
GRP80959	02	0942+6	0947+3 0956	1022	N13	E50	.790	16566	6.2	40	-N						E	
HTPR	02	0942	0947	1025	N13	E50	.790	16566	6.2	43	-F		C	0947	50	.8	E	
KANZ	02	0945	0956	1019	N13	E53	.819	16566	6.4	34	-N	2						
YUNN	02	0948	0950	1010D	N12	E49	.777	16566	6.1	220	1N		C		241	3.7	E	
GRP80960	02	1341+4	1346	1353	S14	E15	.315	16558	3.7	12	-F						E	
HTPR	02	1341	1346	1355	S14	E15	.315	16558	3.7	14	-N		C	1346	80	.8	E	
HUAN	02	1345		1351	S14	E16	.329	16558	3.8	6	-F	1	C					
	02	1454	1459	NO FLARE PATROL														
	02	1543	1546	NO FLARE PATROL														
961 BIGB	02	2339	2352	0015	N19	E90	1.000	16581	9.7	36	-N		C	2352	120	1.3		ZX
GRP80962	03	0050+0	0054+1	0108	N13	E44	.727	16566	6.3	18	-N							
PALE	03	0050	0054	0111	N14	E43	.719	16566	6.3	21	-F	3	C		21		DE	
YUNN	03	0059	0055	0135	N12	E46	.745	16566	6.5	15	1N		C		177	2.6		
963 YUNN	03	0144	0145	0155	S14	W20	.382	16561	1.6	11	-F		C		96	1.0		ZX
964 YUNN	03	0206	0207	0210	N12	E40	.677	16566	6.1	4	-N		C		129	1.7		ZX
965 YUNN	03	0359	0401	0407	N10	E49	.772	16566	6.8	8	-N		C		80	1.2		ZX
966 YUNN	03	0458	0500	0510	S14	E57	.841	16568	7.5	12	-N		C		48	.9		ZX

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS.		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX LON. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONF.	TYPE	TIME UT	MEAS. AREA Millionths of Disk	CORR. AREA Sq. Deg.		
GRP80967	03	0458	0500	0508	N20	E29	.598	16571	5.4	10	-N						U	
YUNN	03	0458	0500	0504	N20	E28	.588	16571	5.3	6	-N		C		113	1.4		
CULG	03	0504E	0508	0512D	N20	E30	.609	16571	5.5	80	-F		P	0508	170	2.0	U	
968 YUNN	03	0536	0539	0543	N18	E30	.593	16571	5.5	13	-N		C		145	1.8		ZX
969 TACH	03	0537	0540	0544	N12	E90	1.000	16581	10.0	7	?F		C	0540	133		DG	ZX
	IMP.1 NO : YUNN																	
970 TACH	03	0630	0633	0635	N12	E90	1.000	16581	10.3	5	?F		C	0633	80		DG	ZX
	IMP.1 NO : YUNN																	
971 YUNN	03	0700E	0700	0705	N19	E28	.573	16571	5.4	50	?N		C		193	2.3		ZX
	IMP.1 NO : TACH CULG																	
GRP80972	03	1021+1	1026+1	1042	S27	E13	.451	16564	4.4	21	-F						E	
HTPR	03	1021	1027	1042	S26	E14	.445	16564	4.5	21	-N		C	1027	80	.9	E	
KANZ	03	1022	1026	1041	S29	E13	.478	16564	4.4	19	-F	2						
973 KANZ	03	1154	1157	1205	N11	E85	.997	16581	9.9	11	-B	2						ZX
GRP80974	03	1238+3	1238+4	1250	S13	E54	.811	16568	7.6	12	-F						E	
KANZ	03	1238	1238	1250	S12	E54	.810	16568	7.6	12	-F	1						
HTPR	03	1241	1242	1250	S14	E54	.812	16568	7.6	9	-N		C	1242	50	.9	E	
GRP80975	03	1638+2	1640 1714	1740	N14	E34	.614	16566	6.2	62	-N						F	
BIGB	03	1638	1655	1735	N14	E35	.626	16566	6.3	57	-N		C	1655	140	1.8		
HOLL	03	1640	1640	1702	N14	E36	.638	16566	6.4	22	-F	2	C		22		F	
HOLL	03	1708	1714	1745	N14	E31	.577	16566	6.0	37	-N	3	C		66		F	
GRP80976	03	1655+1	1657+0	1715	S27	W52	.813	16548	30.8	20	-B				60	1.1	E	
BIGB	03	1655	1657	1733	S27	W54	.836	16548	30.7	38	-B		C	1657	80	1.4		
HUAN	03	1656		1707D	S26	W53	.825	16548	30.7	110	-N	1	P	1657	45	.8	E	
HOLL	03	1656	1657	1713	S28	W51	.814	16548	30.3	17	-B	3	C		58			
RAMY	03	1658E	1658U	1715D	S28	W51	.814	16548	30.3	170	-B	3	C		60			
977 HUAN	03	1802		1806	N14	E32	.589	16566	6.2	4	-F	1	C					ZX
978 HUAN	03	1837	1840	1842	N16	E42	.716	16572	6.9	5	-N	1	C	1840	20	.3	D	ZX
979 HOLL	03	2115	2144	2210	S25	E18	.467	16564	5.2	55	-F	3	C		45			ZX
	04	0003	0005	NO FLARE PATROL														
980 VORO	04	0035E		0046	S28	E15	.477	16564	5.1	110	-N		C	0035	108	1.2		ZX
981 VORO	04	0116	0125	0144	N13	E80	.988	16581	10.1	28	-F		C	0125	99		DH	ZX
982 VORO	04	0117	0124	0138	N20	E16	.472	16571	5.3	21	-N		C	0124	54	.6	E	ZX
GRP80983	04	0202+1	0207+3	0224	S26	E02	.386	16564	4.2	22	-N						EG	
VORO	04	0202	0210	0227	S27	E02	.402	16564	4.2	25	-N		C	0213	90	1.0	E	
YUNN	04	0203	0207	0220	S26	E02	.386	16564	4.2	17	1N		C		209	2.3	G	
984 VORO	04	0328	0344	0400D	N16	E25	.521	16566	6.0	320	?F		P	0344	188	2.3	E	ZX
	IMP.1 NO : YUNN																	
985 YUNN	04	0428	0435	0458	N13	E26	.508	16566	6.1	30	2B		C		482	5.7		ZX
986 YUNN	04	0455	0456	0510	S27	E11	.436	16564	5.0	15	-N		C		80	.9		ZX
GRP80987	04	1043+1	1044+2	1100	N19	E11	.420	16571	5.3	17	-N				120	1.3	E	
MONT	04	1043	1045	1055D	N19	E11	.420	16571	5.3	120	-N		C	1045	110			
HTPR	04	1043	1046	1100	N21	E12	.455	16571	5.3	17	-N		C	1046	140	1.5	E	
KANZ	04	1044	1044	1100	N19	E11	.420	16571	5.3	16	-N	3						
GRP80988	04	1111+5	1123+2	1137	N14	E20	.444	16566	6.0	26	-N						D	
KANZ	04	1111	1123	1138	N15	E21	.465	16566	6.0	27	-B	3					D	
HTPR	04	1116	1125	1135	N14	E20	.444	16566	6.0	19	-F		C	1125	60	.6		
GRP80989	04	1134+2	1147+3 1158	1214	N19	E12	.427	16571	5.4	40	-N						E	
KANZ	04	1134	1150	1150D	N19	E12	.427	16571	5.4	160	-N	3						
HTPR	04	1136	1147	1215	N21	E12	.455	16571	5.4	39	-N		C	1147	140	1.5	E	
MONT	04	1155E	1158	1212	N19	E11	.420	16571	5.3	170	-N		C	1158	70			

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS		MEASUREMENTS			REMARKS
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		COND	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.	
990 HTPR	04	1212	1223	1225	N12	E70	.947	16581	9.8	13	-F		C	1223	40		ZX
GRP80991	04	1253+1	1254	1303	N16	E31	.591	16572	6.9	10	-F				50	.6	
HUAN	04	1253		1303	N15	E32	.537	16572	6.3	10	-F	1	C	1258	30	.4	
HTPR	04	1254	1254	1303	N17	E30	.587	16572	6.8	9	-N		C	1255	70	.8	
992 HTPR	04	1307	1309	1341	N21	E11	.448	16571	5.4	34	-F		C	1309	70	.7	E ZX
993 HTPR	04	1441	1443	1455	N21	E10	.442	16571	5.4	14	-F		C	1443	30	.3	ZX
994 HTPR	04	1516		1543	N15	E18	.432	16566	6.0	27	-B		C	1520	120	1.2	E ZX
	04	1543	1545	NO FLARE PATROL													
995 RAMY	04	1832	1842	1851	N14	E12	.353	16566	5.7	19	-N	3	C		30		ZX
996 HOLL	04	1935	1936	1945	N17	E07	.367	16571	5.3	10	-F	2	C		47		F ZX
997 RAMY	04	1919	1921	1956	N20	E08	.417	16571	5.4	37	-F	3	C		30		ZX
998 RAMY	04	2004E	2010	2011	N16	E27	.544	16572	6.9	70	-F	3	C		28		ZX
999 RAMY	04	2008	2009	2014	N13	E12	.346	16566	5.7	6	-F	3	C		31		ZX
0 BIGB	04	2100	2107	2140	N30	E85	.993	16582	11.3	40	?B		C	2107	70		A ZX
	IMP.1 NO ! HOLL																
	04	2359	0000	NO FLARE PATROL													
	05	0017	0023	NO FLARE PATROL													
1 PURP	05	0133	0138	0144	N15	E24	.502	16572	6.8	41	-F		C				ZX
2 PALE	05	0235	0236	0245	N16	E22	.488	16572	6.8	10	-F	3	C		21		DE ZX
3 PURP	05	0431	0432	0440	S30	W02	.446	16564	5.0	9	-F		C				ZX
GRP81004	05	0505+4	0510	0543	S15	W25	.457	16558	3.3	38	1N						EK
			0523+2														
YUNN	05	0505	0510	0533	S13	W28	.483	16558	3.1	28	1B	*	C		193	2.2	EK
MITK	05	0506	0523	05440	S15	W25	.457	16558	3.3	380	-N	*	C	0523			E
PURP	05	0509	0525	0543	S17	W25	.470	16558	3.3	34	1N	*	P				
GRP81005	05	0508+1	0508+2	0513	N19	E01	.383	16571	5.3	11	1N						
YUNN	05	0508E	0508	0516	N19	E01	.383	16571	5.3	80	1B		C		209	2.3	
PURP	05	0509	0513	0521	N19	E01	.383	16571	5.3	12	1N		P				
6 PURP	05	0645	0647	0657	N17	E67	.935	16581	10.3	12	-N		P				ZX
7 CATA	05	0725	0725	0730	N11	W05	.264		4.3	5	-F	2	C	0725	28	.3	ZX
8 YUNN	05	0830	0831	0835	N20	E00	.398	16571	5.4	5	-N		C		129	1.4	ZX
GRP81003	05	0925+0	0930	1000	N22	00	.430	16571	5.4	35	1N						
			0937														
CATA	05	0925	0930	1000	N22	W01	.430	16571	5.3	35	1N	2	C	0930	224	2.5	
YUNN	05	0925	0937	09400	N22	E01	.430	16571	5.5	150	1N		C		257	2.8	
10 CATA	05	1025	1040	1215	S25	E10	.400	16574	6.2	110	2N	2	C	1040	562	6.3	ZX
11 CATA	05	1130	1135	1200	S29	W05	.438	16564	5.1	30	-N	2	C	1135	112	1.2	ZX
GRP81012	05	1327		1420!	S11	E70	.938	16577	10.8	53	-N						E
HUAN	05	1327		1420	S11	E70	.938	16577	10.8	53	-N	1	C	1400	30		E
HTPR	05	1330E		15450	S12	E70	.938	16577	10.8	1350	-N		C	1338	40		
GRP81013	05	1432>9	1434	1504	N19	E44	.752	16580	8.9	32	-F						
			1458														
HTPR	05	1432	1434	1502	N18	E44	.748	16580	8.9	30	-F		C	1434	10	.1	
HOLL	05	1455	1458	1506	N20	E45	.766	16580	9.0	11	-F	3	C		40		
GRP81014	05	1510E	1531+1	16341	N13	E05	.236	16566	6.0	84	-N				110	1.2	
HTPR	05	1423E		15450	N14	E06	.317	16566	6.1	760	-N	*	C	1505	50	.5	E
HOLL	05	1510	1532	15470	N13	E04	.291	16566	5.9	370	-B	*	C		108		F
RAMY	05	1521	1531	16340	N14	E05	.312	16566	6.0	730	-B	*	C		162		FDE
HUAN	05	1530		15400	N13	E05	.236	16566	6.0	100	-N	*	P	1535	45	.5	E
15 RAMY	05	1521E	1525	1618	N19	E46	.772	16580	9.1	570	-F	3	C		75		ZX

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OBSERVATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS.		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX LONG. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONF.	TYPE	TIME UT	MEAS. AREA Mill of Disk	CORR AREA Sq. Deg.		
16 HIPR	05	1522		1525	N20	W02	.400	16571	5.5	3	-N		C	1524	30	.3	E	ZX
17 HOLL	05	1523	1523	1529	N17	E65	.323	16581	10.5	6	-F	3	C		27			ZX
GRP81018	05	1543+2	1544+4 1558	1613	N19	E74	.971	16583	11.2	30	1N						F	
RAMY	05	1523	1544	1557	N19	E73	.967	16583	11.1	34	-N	*	C					
BIGB	05	1543	1544	1610	N20	E76	.979	16583	11.4	27	1B	*	C	1544	170			
HOLL	05	1545	1548	1606D	N21	E73	.968	16583	11.1	210	1N	*	C				F	
HUAN	05	1551E		1553D	N18	E75	.974	16583	11.3	2D	-F	*	P	1552	40		E	
RAMY	05	1557	1558	1615	N19	E70	.953	16583	10.9	18	1N	*	C		162		F	
19 RAMY	05	1548	1623	17370	S10	E66	.912	16577	10.6	109D	-F	3	C		63			ZX
GRP81020	05	1707+4	1708	1725	N13	E06	.301	16566	6.2	18	-F							
HOLL	05	1707	1708	1712	N13	E04	.291	16566	6.0	5	-F	3	C		21			
RAMY	05	1711	1734	17370	N14	E09	.336	16566	6.4	26D	-F	3	C		54			
	05	1737	1743	NO FLARE PATROL														
21 HOLL	05	1746	1818	1829	S08	E66	.912	16577	10.7	43	-N	3	C		30			ZX
22 HOLL	05	1756	1758	1814	N14	E05	.312	16566	6.1	18	-N	3	C		114			ZX
23 HOLL	05	1837	1839	1846	S24	W09	.379	16564	5.1	9	-F	3	C		24			ZX
GRP81024	05	1856>3	1916+1	1936	N13	E02	.286	16566	5.3	40	-B				140	1.5		
RAMY	05	1856	1917	1929	N14	E03	.304	16566	6.0	33	-B	3	C		151			
PALE	05	1914	1916	19430	N13	E02	.286	16566	6.3	29D	-B	3	C		132		DE	
GRP81025	05	1942>9	1951+3	2003	S09	E65	.905	16577	10.7	21	-N				30	.7		
RAMY	05	1342	1352	2003	S10	E64	.897	16577	10.6	21	-N	3	C		34			
PALE	05	1948	1951	1958	S09	E66	.912	16577	10.8	10	-N	3	C		26			
HOLL	05	1952	1954	2004	S09	E65	.905	16577	10.7	12	-N	3	C		27			
26 CULG	05	2008E	2008E	2036U	N13	E07	.307	16566	6.4	28D	?F		P	2008	280	2.8	BF	ZX
	IMP.1 NO : PALE HOLL																	
27 CULG	05	2119	2128	2131U	S11	E67	.913	16577	10.3	12D	?N		C	2128	100	2.5		ZX
	IMP.1 NO : PALE HOLL																	
GRP81028	05	2137>9	2143 2211	2223	S25	W11	.407	16564	5.1	46	-F						F	
PALE	05	2137	2143	2213	S27	W11	.435	16564	5.1	36	-F	3	C		35		F	
HOLL	05	2208	2211	2232	S23	W12	.386	16564	5.0	24	-F	3	C		37			
29 PALE	05	2143	2148	2222D	N18	E40	.706	16580	8.9	42D	-N	3	C		28		F	ZX
30 CULG	05	2233E	2234U	2234D	S12	W40	.643	16558	2.3	1D	-N		P	2234	90	1.3	F	ZX
31 YUNN	06	0100E	0100	0110	N12	E11	.326	16572	6.9	10D	-B		C		96	1.0		ZX
32 PURP	06	0107	0133	0247	S11	E66	.912	16577	11.0	100	-N		C					ZX
33 YUNN	06	0156E	0156	0205	N11	W05	.266	16566	5.7	9D	-N		C		145	1.5		ZX
GRP81034	06	0431	0514+9 0602+8	0712	N18	E40	.706	16580	9.2	161	1N						FIZ	
PURP	06	0431	0523	0748	N18	E43	.738	16580	9.4	137	1N		C					
CULG	06	0500U	0514U	0600U	N18	E39	.696	16580	9.1	60D	2N		C	0514	830	11.6	IF	
YUNN	06	0556	0611	0712	N18	E42	.728	16580	9.4	76	1N		C		306	4.4	EF	
MITK	06	0559	0602	0626	N18	E40	.706	16580	9.2	27	1F		C	0602	220	3.2	E	
MITK	06	0631	0634	0639D	N18	E40	.706	16580	9.3	8D	1F		C	0634	300	4.3	EZ	
MANI	06	0640E	0644U	0650D	N13	E36	.669	16580	9.0	10D	-F	3	V		100	1.4	F	
35 YUNN	06	0546E	0546	0621	S11	E60	.865	16577	10.7	35D	?B		C		113	2.2		ZX
	IMP.1 NO : MITK PURP CULG																	
36 YUNN	06	0621	0624	0631	N12	W08	.301	16566	5.7	10	-N		C		113	1.2		ZX
37 YUNN	06	0624	0626	0636	N21	E16	.487	16572	7.5	12	-N		C		129	1.5	E	ZX
38 YUNN	06	0633	0642	0700	S11	E60	.865	16577	10.8	21	-N		C		48	.7		ZX

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OBSERVATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS.		MEASUREMENTS			REMARKS
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		COND.	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.	
GRP81039	06	0639+7	0642 0712+2	0740	S21	E30	.559	16576	8.5	61	2N				620	7.5	FIU
YUNN	06	0639	0642	0651	S22	E23	.554	16576	8.5	12	-N	*	C		80	1.0	
CULG	06	0643E	0714U	0752D	S22	E30	.565	16576	8.5	690	2N	*	P	0714	620	7.4	UIF
PURP	06	0646	0712	0748	S21	E31	.571	16576	8.6	62	2B	*	P		717	8.6	
MANI	06	0712E	0712U	0719	S18	E35	.604	16576	8.9	70	-N	*	V		120	1.6	F
YUNN	06	0712E	0712	0731	S22	E23	.554	16576	8.5	190	2B	*	C		772	9.3	
40 CATA	06	1000	1315	1110	N22	E35	.678	16580	9.0	700	-N	2	P	1015	140	1.9	ZX
	06	1110	1125	NO FLARE PATROL													
41 RAMY	06	1158E	1201	1207	S10	E54	.808	16577	10.5	90	-F	2	C		25		ZX
42 RAMY	06	1201	1207	1220	N19	E34	.648	16580	9.1	27	-F	2	C		67		ZX
43 RAMY	06	1237	1237	1247	S10	E54	.808	16577	10.6	10	-F	2	C		113		ZX
44 RAMY	06	1244	1250	1310	N19	E34	.648	16580	9.1	34	-N	2	C		47		ZX
45 RAMY	06	1253	1310	1322	N16	E50	.800	16581	10.3	29	-F	2	C		44		ZX
46 RAMY	06	1327	1327	1334	N19	E32	.626	16580	9.0	7	-F	2	C		32		ZX
47 RAMY	06	1332	1333	1335	S10	E54	.808	16577	10.6	3	-F	3	C		30		ZX
48 RAMY	06	1353	1401	1413	S10	E53	.798	16577	10.6	20	-N	3	C		86		ZX
49 RAMY	06	1536	1536	1539	S11	E55	.818	16577	10.8	3	-F	3	C		22		ZX
GRP81050	06	1651+8	1652	1656+	N18	E31	.607	16580	9.0	5	-N				20	.3	D
HUAN	06	1651		1656D	N17	E32	.612	16580	9.1	50	-N	1	P	1654	20	.3	D
RAMY	06	1651	1652	1654D	N19	E30	.604	16580	9.0	30	-N	3	C		24		
	06	1656	1737	NO FLARE PATROL													
	06	1746	1803	NO FLARE PATROL													
51 RAMY	06	1821	1823	1832	S10	E51	.777	16577	10.6	11	-F	2	C		38		ZX
52 RAMY	06	1842	1843	1847	S19	W41	.681	16558	3.7	5	-N	2	C		26		ZX
	06	1850	1856	NO FLARE PATROL													
	06	1957	2015	NO FLARE PATROL													
53 CULG	06	2055	2058	2109	S05	E56	.828	16577	11.1	14	-F		C	2058	60	1.1	ZX
	06	2116	2127	NO FLARE PATROL													
54 CULG	06	2127E	2131U	2215U	S12	E52	.789	16577	10.8	480	1N		P	2131	320	4.8	T ZX
55 CULG	06	2305	2315	2331	S08	E53	.737	16577	10.3	26	1F		C	2315	150	2.4	ZX
56 CULG	06	2325	2336	2358	S20	W45	.729	16558	3.6	33	1N		C	2336	250	3.5	ZX
57 CULG	07	0004	0008	0014	S30	W24	.570	16564	5.2	10	-F		C	0008	100	1.0	ZX
58 VORO	07	0108	0111	0114D	N10	W08	.273	16566	6.4	60	-F		P	0111	152	1.6	E ZX
59 CULG	07	0141	0146U	0149D	S17	E04	.240	16568	7.4	80	-F		P	0146	80	.8	ZX
GRP81060	07	0154E	0154	0220	S11	E48	.744	16577	10.7	26	1B						
PALE	07	0154E	0154U	0217	S11	E49	.756	16577	10.8	230	1B	2	C		265		F
VORO	07	0218E		0223	S12	E48	.745	16577	10.7	130	-N		P	0210	108	1.6	E
GRP81061	07	0229>9	0246+4	0314	S08	E50	.765	16577	10.9	45	1N				290	4.5	F
CULG	07	0223	0246U	0314	S08	E51	.776	16577	10.9	45	2N	*	C	0246	380	5.7	F
VORO	07	0242	0250	0256D	S08	E50	.765	16577	10.9	140	1F	*	C	0250	206	3.3	
62 VORO	07	0230	0235	0246	N18	E20	.490	16580	8.6	16	-N		C	0235	116	1.4	EHJ ZX
63 CULG	07	0310E	0314E	0314U	S15	E00	.136	16568	7.1	40	-F	*	P	0314	170	1.7	F ZX
64 PALE	07	0312	0316	0332	N12	E40	.679	16581	10.1	20	-F	2	C		71		F ZX
65 VORO	07	0348	0350	0400D	N18	E22	.510	16580	8.8	120	-N		C	0350	125	1.5	ZX
	07	0447	0450	NO FLARE PATROL													

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	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONF.	TYPE	TIME UT	MEAS. AREA Mil. of Disk	CORR AREA Sq. Deg.	
	07	0734	0735	NO FLARE PATROL													
66 KANZ	07	0824	0824	0840	S12	E46	.722	16577	10.8	16	-F	1					ZX
67 MONT	07	0919	0921	0938	N18	E21	.500	16580	9.0	19	-N		C	0921	70		ZX
GRP81068	07	1007+2	1010+0	1022	N18	E21	.500	16580	9.0	15	-N				90	1.8	
MONT	07	1007	1010	1020	N18	E21	.500	16580	9.0	13	-N		C	1010	70		
KANZ	07	1009	1010	1025	N18	E21	.500	16580	9.0	16	-N	3					
KHAR	07	1010E		1022D	N17	E20	.479	1658J	8.9	12D	-N		P	1013	120	1.4	
GRP81069	07	1057+1	1100+2 1113	1117	S10	E46	.720	16577	10.9	20	-N						E
KANZ	07	1057	1102	1116	S10	E45	.708	16577	10.8	19	-N	3					
MONT	07	1058	1100	1111	S1J	E47	.732	16577	11.J	13	-N		C	1100	200		
MONT	07	1112	1113	1118	S10	E47	.732	16577	11.0	6	-F		C	1113	50		E
GRP81070	07	1105+0	1106+1	1113	N18	E20	.490	16580	9.0	8	-F						E
KANZ	07	1105	1106	1113	N18	E21	.500	16580	9.0	8	-F	2					
MONT	07	1105	1107	1113	N18	E2J	.490	1658J	9.J	8	-F		C	1107	50		E
71 KANZ	07	1124		1157	S11	E43	.685	16577	10.7	33	-F	1					K ZX
72 KANZ	07	1209	1210	1224	N21	E85	.338	16587	13.3	15	-F	2					ZX
GRP81073	07	1213+3	1217 1315+2	1334	S10	E43	.684	16577	10.7	81	-B				100	1.4	E
RAMY	07	1213	1316	1334	S08	E44	.694	16577	10.8	81	-B	3	C		115		
MONT	07	1213	1217	12200	S12	E43	.686	16577	10.7	70	-F		C	1217	60		E
KANZ	07	1216	1315	1333	S10	E45	.708	16577	10.9	77	-B	2					
MONT	07	1254	1315	1325	S12	E43	.686	16577	10.8	31	-N		C	1315	110		E
ATHN	07	1315E	1317	13370	S11	E42	.672	16577	10.7	220	-B	3	S	1317	82	1.1	
74 RAMY	07	1347	1352	1354	N19	E15	.455	16580	8.7	7	-F	3	C		28		ZX
GRP81075	07	1359+0	1403+3	1421	S13	W56	.830	16558	3.4	22	-F				50	.9	E
MONT	07	1359	1403	1416	S13	W57	.833	16558	3.3	17	-F		C	1403	50		E
RAMY	07	1359	1406	1425	S14	W55	.821	16558	3.5	26	-F	3	C		47		
	07	1452	2JJ4	NO FLARE PATROL													
76 RAMY	07	1500	1500	1508	N16	E35	.640	16581	10.3	8	-F	3	C		13		ZX
77 RAMY	07	1857	1903	19050	S17	W60	.868	16558	3.3	8D	1N	3	C		141		F ZX
78 RAMY	07	1942	1944	1950	N20	W03	.405	16572	7.6	8	-N	3	C		67		ZX
	07	2006	2014	NO FLARE PATROL													
79 RAMY	07	2039	2042	2J51	N16	E15	.442	1658J	9.J	12	-N	3	C		47		F ZX
	07	2102	2119	NO FLARE PATROL													
	07	2120	2123	NO FLARE PATROL													
80 CULG	07	2135	2136	2142	S3J	W36	.682	16564	5.2	7	-F		C	2136	4J	.5	ZX
81 CULG	07	2220	2227	2235	N19	E11	.425	16580	8.8	15	-F		C	2227	100	1.0	ZX
82 CULG	07	2330	2335	2346	N25	E85	.333	16588	14.4	16	?F		C	2335	100		ZX
	IMP.1 NO : MITK																
GRP81083	07	2348+0	2351+1	0007	S10	E33	.632	16577	10.3	19	1F				170	2.2	EM
MITK	07	2348	2352	0016	S10	E39	.632	16577	10.3	28	1F		C	2352	170	2.3	EM
CULG	07	2348	2351	2358	S1J	E4J	.645	16577	11.J	1J	1N		C	2351	18J	2.3	
84 YUNN	08	0028	0030	0036	N18	E14	.435	16580	9.1	8	?N		C		241	2.8	EF ZX
	IMP.1 NO : CULG MITK																
GRP81085	08	0108+J	0109+1	0112	S29	W38	.694	16564	5.2	4	-F				80	1.1	DG
CULG	08	0108	0109	0112	S30	W39	.710	16564	5.1	4	-N		C	0109	80	1.1	
VORO	08	0108	0110	0111	S28	W38	.688	16564	5.2	3	-F		C	0110	81	1.1	DG
GRP81086	08	0119+2	0121+5	0134	S10	E39	.632	16577	11.0	15	1N				210	2.7	D
CULG	08	0119	0126	0135	S3J	E4J	.644	16577	11.1	16	1F		C	0126	230	2.9	T
VORO	08	0120	0121	0134	S10	E39	.632	16577	11.0	14	-N		C	0121	72	.9	D
YUNN	08	0121	0125	0131	S12	E38	.622	16577	10.9	10	1N		C		209	2.7	

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	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONF.	TYPE	TIME UT	MEAS. AREA millionths of Disk	CORR AREA Sq. Deg.		
87 VORO	08	0150	0152	0203	N18	E08	.394	16580	8.7	13	-N		C	0152	99	1.1	E	ZX
GRP81088	08	0214+4	0215+4	0240	S09	E40	.644	16577	11.1	26	-F						EJ	
VORO	08	0214	0218	0305	S11	E36	.593	16577	10.8	51	1F		C	0218	334	5.0	EJ	
MANI	08	0215E	0215U	0240U	S09	E40	.644	16577	11.1	25U	-N	3	V		35	.5		
CULG	08	0218	0219	0231	S09	E40	.644	16577	11.1	13	-F		C	0219	150	2.0	T	
GRP81089	08	0351+8	0355	0455	N18	E09	.399	16580	8.8	64	1N						IL	
			0413+7															
CULG	08	0351	0416	0459	N25	E07	.494	16580	8.7	68	2N		C	0416	840	8.4	IFL	
VORO	08	0354	0355	0359U	N18	E14	.435	16580	9.2	5U	-N		P	0355	81	1.9	D	
YUNN	08	0359	0404	0430	N18	E06	.384	16580	8.6	31	1N		C		267	2.8	E	
MITK	08	0412	0413	0444	N18	E10	.406	16580	8.9	32	-N		C	0413			E	
YUNN	08	0413	0420	0455	N19	E12	.433	16580	9.1	42	1N		C		193	2.2	EF	
MANI	08	0415E	0415U	0420U	N18	E08	.394	16580	8.8	5U	-N	3	V		83	.9		
81098	08	0359	0404	0418	N23	W02	.452	16572	8.8	19	-N				40	.4	G	
YUNN	08	0359	0404	0430	N25	E00	.482	16572	8.2	31	1N		C		241	2.8	G	
MANI	08	0415E	0415U	0418	N23	W02	.452	16572	8.8	3U	-F	3	V		40	.5		
91 CULG	08	0420	0421	0428	S15	W66	.912	16556	3.2	8	?F		C	0421	180	2.3		ZX
	IMP.1 NO 1 YUNN MITK																	
92 YUNN	08	0542	0544	0552	S11	E37	.607	16577	11.0	10	-N		C		48	.6		ZX
93 YUNN	08	0750	0752	0815	S10	E35	.577	16577	11.0	25	-F		C		63	.8	FZ	ZX
GRP81094	08	0843+2	0900+2	0910	S10	E33	.549	16577	10.8	27	-N				120	1.4	FHZ	
KANZ	08	0843	0903	0913	S13	E33	.549	16577	10.8	27	-N	1						
MONT	08	0844	0901	0909	S10	E35	.577	16577	11.0	25	-N		C	0901	110			
YUNN	08	0845	0902	0915	S11	E33	.552	16577	10.8	30	-N		C		126	1.5	FHZ	
GRP81095	08	0922+3	0928+1	0945	N18	E07	.389	16580	8.9	23	-N				100	1.1	E	
KANZ	08	0922	0929	0941	N19	E07	.404	16580	8.9	19	-N	2					E	
MONT	08	0924	0928	0941	N19	E08	.409	16580	9.0	17	-N		C	0928	100		E	
YUNN	08	0925		0950	N18	E08	.334	16580	9.0	25	1N		C	0929	204	2.2		
KHAR	08	0926E		0940U	N17	E05	.365	16580	8.8	14U	-F		V					
WEND	08	0929E		0949	N18	E07	.389	16580	8.9	20U	-N		C	0933	70	.8		
GRP81096	08	0945+1	0947+2	1010	N06	E46	.731	16586	11.9	25	-F				80	1.2	E	
WEND	08	0945	0943	1010	N07	E47	.745	16586	11.9	25	-F		C	0943	94	1.4		
KHAR	08	0946	0947	1002U	N06	E46	.731	16586	11.9	16U	-F		P	0949	80	1.2	E	
GRP81097	08	0956+2	1008>9	1136	S11	E31	.523	16577	10.7	100	1B						EHKOVW	
			1126															
YUNN	08	0956E	1010	1010U	S11	E32	.537	16577	10.8	14U	2B		C		566	7.4	E	
WEND	08	0958	1017	1116U	S10	E32	.535	16577	10.8	78U	2B		C	1017	680	8.4	Z	
KANZ	08	0958	1010	1159	S10	E32	.535	16577	10.8	121	1B	3						
MONT	08	0958	1018	1123	S10	E32	.535	16577	10.8	85	2B		C	1018	700			
KHAR	08	0958	1008	1135U	S11	E32	.537	16577	10.8	97U	2B		P	1014	440	5.4	EHKOV	
TELV	08	1031E	1313	1137	S11	E29	.494	16577	10.6	66U	-B	2			82	1.0	H	
ATHN	08	1010E	1013	1147	S11	E29	.494	16577	10.6	97U	1B	3	V	1013	245	2.9		
MONT	08	1124	1126	1144	S11	E31	.523	16577	10.8	20	-N	*	C	1126	150			
KHAR	08	1132E		1135U	S11	E33	.552	16577	11.0	3U	-F	*	P				D	
GRP81098	08	1039+6	1058+7	1130	N11	E24	.471	16581	10.2	51	1N				440	5.0	HO	
KANZ	08	1039	1058	1130	N11	E23	.458	16581	10.2	51	2N	3						
MONT	08	1040	1058	1138	N11	E23	.458	16581	10.2	58	2N		C	1058	600			
WEND	08	1042	1105	1116U	N11	E24	.471	16581	10.2	34U	1N		C	1105	330	3.8	F	
KHAR	08	1047	1059	1135U	N12	E24	.479	16581	10.2	18U	2F		P	1105	550	6.4	EHO	
ATHN	08	1054	1101	1117	N13	E25	.500	16581	10.3	23	-N	3	V	1101	98	1.1		
99 RAMY	08	1248	1251	1312	N16	E23	.502	16581	10.3	24	-F	3	C		27			ZX
GRP81100	08	1342+2	1344+3	1350	S13	E32	.535	16577	11.0	8	-N						E	
KANZ	08	1342	1347	1350	S11	E32	.537	16577	11.0	8	-N	2					E	
RAMY	08	1344	1344	1350	S10	E32	.535	16577	11.0	6	-N	3	C		24			
101 RAMY	08	1420	1420	1435	N17	E24	.523	16581	10.4	15	-F	3	C		28			ZX
102 WEND	08	1435	1441	1510U	N18	E04	.377	16580	8.9	35U	*-N		C	1441	75	.8		ZX
GRP81103	08	1452+3	1456	1510	N17	E23	.512	16581	10.3	18	-F				90	1.0		
HOLL	08	1452	1456	1509	N18	E22	.511	16581	10.3	17	-F	3	C		109			
WEND	08	1455		1513U	N16	E24	.514	16581	10.4	15U	-F		C	1457	80	.9		

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS		MEASUREMENTS			REMARKS
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX LONG. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONG	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.	
GRP81104	08	1518>9	1538+2	1608	N18	E04	.377	16580	8.9	50	-N				80	.9	F
HOLL	08	1518	1538	1602	N18	E01	.372	16580	8.7	44	-N	3	C		165		F
HUAN	08	1532		1547D	N18	E05	.380	1658J	9.J	15D	-F	1	P	1536	70	.8	E
RAMY	08	1533E	1540	1614	N18	E04	.377	16580	8.9	41D	-N	3	C		83		F
GRP81105	08	1528+2	1531+0	1545	S13	E26	.458	16577	10.6	17	-8				150	1.7	
HUAN	08	1528	1531	1539	S15	E26	.469	16577	10.6	11	-N	2	C	1531	100	1.2	E
HOLL	08	1530	1531	1545	S13	E26	.458	16577	10.6	15	-8	3	C		187		F
RAMY	08	1532E	1532U	1548	S12	E28	.483	16577	10.7	16D	-8	3	C		145		FDE
106 HOLL	08	1545	1546	1552	N16	E21	.480	16581	10.2	7	*-F	3	C		33		ZX
107 HOLL	08	1552	1556	16J9	N18	E22	.511	16581	10.3	17	*-F	3	C		109		ZX
108 HOLL	08	1630	1631	1633D	S09	E28	.474	16577	10.8	30	-8	3	C		187		ZX
GRP81103	08	1705+5	1714+6	1748	S10	E23	.491	16577	10.9	43	-N				90	1.0	FU
BIGB	08	1705	1714	1813	S12	E29	.498	16577	10.9	68	1B		C	1714	230	2.7	
HOLL	08	1708	1720	1748	S09	E27	.459	16577	10.7	40	-N	3	C		93		U F
RAMY	08	1710	1718	1745	S10	E29	.491	16577	10.3	35	-N	3	C		91		F
110 BIGB	08	2018	2019	2047	N36	E90	1.001	16595	15.6	29	-N		C	2019	90		ZX
GRP81111	08	2026+1	2028+1	2051	N20	E02	.405	16580	9.0	25	-N				90	1.0	F
HOLL	08	2026	2029	2052	N21	E03	.422	16580	9.1	26	-N	3	C		103		F
RAMY	08	2027	2028	2049	N19	E02	.383	16580	9.0	22	-N	3	C		75		F
GRP81112	08	2156+3	2204+7 2238	2308	N14	E19	.437	16581	10.3	72	-N				100	1.1	F
HOLL	08	2156	2204	2233	N14	E20	.449	16581	10.4	37	-N	3	C		102		F
BIGB	08	2159	2211	2314	N12	E18	.405	16581	10.3	75	-8		P	2211	110	1.2	
HOLL	08	2237	2238	2302	N17	E21	.490	16581	10.5	25	-N	3	C		40		
113 HOLL	08	2206	2208	2231	S09	E24	.413	16577	10.7	25	-N	3	C		33		F ZX
GRP81114	09	0000+5	0030+2	0107	S09	E25	.428	16577	10.8	67	2B				520	5.8	FU
CULG	09	0000E	0000E	0010	S10	E25	.431	16577	10.9	100	-F		C	0000	100	1.1	FT
MANI	09	0005	0033	0103	S09	E25	.428	16577	10.9	58	1B	3	V		350	4.0	U
CULG	09	0022	0032	0110	S10	E25	.431	16577	10.9	48	2B		C	0032	690	7.6	UT
115 CULG	09	0034	0045	0100	S25	W56	.845	16564	4.8	26	-F		C	0045	40	.8	ZX
116 CULG	09	0059	0104	0131U	N16	E18	.449	16581	10.4	32D	1F		C	0104	220	2.4	L ZX
GRP81117	09	0240	0253	0335	N22	E05	.444	16580	9.5	55	1F						F
CULG	09	0240	0253	0335	N23	E04	.457	16580	9.4	55	1F		C	0253	380	4.2	F
MANI	09	0305E	0305U	0325D	N21	E07	.436	16580	9.7	20D	-N	3	V		70	.8	F
118 CULG	09	0335	0404U	0415	S13	E22	.400	16577	10.8	40	1F		C	0404	230	2.5	FT ZX
119 CULG	09	0359	0405	0424	N24	E70	.359	16588	14.4	25	1F		C	0405	100		ZX
120 MANI	09	0547E	0550	0620	S11	E19	.344	16577	10.7	150	-N	3	V		50	.5	F ZX
GRP81121	09	0625+1	0627+1	0636	S14	E17	.335	16577	10.5	11	-N				100	1.1	EV
YUNN	09	0625E	0628	0637	S14	E18	.349	16577	10.6	12D	-N		C		73	.8	E
ABST	09	0626	0627	0635	S15	E17	.343	16577	10.5	9	-N		P	0627	131	1.4	EV
GRP81122	09	0640+5	0652+3 0708	0804	N19	E65	.926	16587	14.2	84	1N				130		EGJU
CULG	09	0640	0708	0810	N20	E65	.928	16587	14.2	90	1N	+	C	0708	260		U
ABST	09	0645E	0652	07J7D	N19	E65	.926	16587	14.2	22D	1N	*	P	0652	157		EGJ
YUNN	09	0645	0655	0758	N17	E62	.904	16587	13.9	73	1B	*	C		113	2.6	
123 YUNN	09	0642	0645	0648	S11	E21	.374	16577	10.3	6	?N		C		220	2.4	ZX
	IMP.1 NO : CULG ABST																
124 YUNN	09	0655	0657	0710	N13	E04	.233	16581	9.6	15	-N		C		48	.5	ZX
125 YUNN	09	0708	0713	0716	S09	E22	.382	16577	10.9	8	-N		C		96	1.0	ZX
126 CULG	09	0709	0714	0730	S20	W85	.994	16558	2.9	21	?F		C	0714	200		ZX
	IMP.1 NO : YUNN																
127 YUNN	09	0805	0808	0813	S10	E20	.354	16577	10.8	8	-N		C		161	1.7	ZX
128 YUNN	09	0842	0844	0845D	S12	E20	.365	16577	10.9	3D	?N		C		133	2.7	ZX
	IMP.1 NO : ABST																

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS.		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX LONG. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		COND	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.		
129 KANZ	09	0847E	0851	0910	N11	E12	.327	16581	10.3	230	-F	1					H	ZX
GRP81130	09	0920+3	0923	0929	N09	E74	.365	16590	14.9	9	-F						DL	
KHAR	09	0920E		09300	N09	E76	.374	16590	15.1	100	-F		V				DL	
KANZ	09	0923	0923	0927	N09	E73	.361	16590	14.9	4	-F	1						
GRP81131	09	0927+3	0937+3	1033	S18	W80	.983	16558	3.4	66	-F						OHO	
WEND	09	0927		1011	S18	W82	.388	16558	3.2	44	-N		C	0946	47			
YUNN	09	0930	0937	09500	S18	W75	.364	16558	3.8	280	-N		C		48			
KANZ	09	0930		1038	S18	W78	.976	16558	3.5	68	-F	1						
KHAR	09	0935E	0948	10330	S17	W82	.988	16558	3.2	580	-F		P				OHO	
132 KHAR	09	0940E		09400	S11	E21	.374	16577	11.0		-F		P				EO	ZX
133 KHAR	09	0955E		10050	N14	W24	.497	16572	7.6	100	-F		P				O	ZX
134 WEND	09	1057		1203	S09	E20	.350	16577	11.0	66	-F		C	1133	88	1.0		ZX
135 WEND	09	1105		1217	S18	W83	.991	16558	3.2	72	-F		C	1118	30			ZX
136 KANZ	09	1118	1123	1135	N16	E14	.411	16581	10.5	17	-F	2						ZX
GRP81137	09	1242>3	1257+0	1312	S18	W81	.986	16558	3.5	30	-N							
WEND	09	1242	1257	13060	S18	W84	.993	16558	3.2	240	1N		C	1257	53			
KANZ	09	1252	1257	1312	S18	W78	.976	16558	3.7	20	-N	1						
138 RAMY	09	1356	1357	1415	N16	E10	.378	16581	10.3	19	-N	3	C		23			ZX
	09	1430	1444	NO FLARE PATROL														
	09	1517	1526	NO FLARE PATROL														
	09	1529	1630	NO FLARE PATROL														
	09	1639	1819	NO FLARE PATROL														
139 RAMY	09	1852	1853	1911	N16	E07	.360	16581	10.3	19	-F	3	C		34			ZX
	09	1949	2159	NO FLARE PATROL														
	09	2208	2251	NO FLARE PATROL														
	09	2343	2349	NO FLARE PATROL														
140 CULG	10	0002	0013	0028	N15	W31	.589	16572	7.7	26	?F		C	0013	230	2.9	F	ZX
	IMP.1 NO : MITK																	
141 YUNN	10	0100E	0100	0115	S17	W81	.385	16558	4.0	150	-N		C	0101	32			ZX
GRP81142	10	0135	0144	0214	S12	E08	.195	16577	10.7	39	?N							
			0157															
YUNN	10	0135	0144	0200	S12	E08	.195	16577	10.7	25	?N		C		177	1.8	EF	
	IMP.1 NO : CULG MITK																	
YUNN	10	0150	0157	0214	S12	E08	.195	16577	10.7	24	1N		C		257	2.6	EF	
143 YUNN	10	0150	0157	0220	N20	W12	.450	16580	9.2	30	-N		C		48	.5		ZX
GRP81144	10	0216>3	0228+6	0250	S12	E07	.183	16577	10.6	34	-N						E	
			0240															
MITK	10	0216	0229	0258	S13	E07	.197	16577	10.6	42	-F		C	0229			E	
PURP	10	0219	0228	0241	S12	E08	.195	16577	10.7	22	1N		P					
YUNN	10	0220	0240	0255	S12	E08	.195	16577	10.7	35	1B		C		337	3.4		
CULG	10	0227	0234	0245	S13	E07	.197	16577	10.6	18	-N		C	0234	100	1.0		
145 YUNN	10	0345	0347	0415	S13	W33	.556	16568	7.7	30	?N		C		225	2.7	E	ZX
	IMP.1 NO : MITK																	
GRP81146	10	0459+1	0512+4	0630	S11	E09	.196	16577	10.9	91	2N				700	7.1	FIKU	
YUNN	10	0448	0516	0710	S11	E09	.196	16577	10.9	142	2B		C		833	8.5	FK	
CULG	10	0459	0514U	0618D	S12	E09	.207	16577	10.9	730	2N		P	0514	740	7.4	FI	
MITK	10	0500	0512	0630	S11	E11	.224	16577	11.0	90	2N		C	0512	530	5.6	EFU	
MANI	10	0536E	0536U	0543D	S10	E07	.159	16577	10.8	70	1N	3	V		210	2.2	F	
147 CULG	10	0757	0800	0802	N15	W26	.530	16580	8.4	5	-F		C	0800	40	.5		ZX
GRP81148	10	1013+1	1028+1	1046	S09	E07	.149	16577	11.0	27	-F						E	
KANZ	10	1019	1028	1046	S09	E07	.149	16577	11.0	27	-F	1						
WEND	10	1020	1029	1045	S09	E07	.149	16577	11.0	25	-F		C	1029	94	1.0	E	

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS		MEASUREMENTS			REMARKS
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONQ	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.	
GRP81149	10	1058+2	1105+0	1114	N22	W17	.513	16580	9.2	16	-F						
WEND	10	1058	1105	1117	N22	W16	.506	16580	9.3	19	-N		C	1105	38	.4	D
KANZ	10	1100	1105	1111	N22	W18	.521	16580	9.1	11	-F	1					E
GRP81150	10	1132		13461	N17	W37	.671	16572	7.7	134	-F						
WEND	10	1132		1346D	N15	W38	.671	16572	7.6	1340	-F		C	1323	81	1.1	
WEND	10	1240		1332	N20	W36	.679	16572	7.8	52	-F	*	C	1315	53	.7	
151 WEND	10	1202		1235	S12	E68	.925	16592	15.6	33	-F		C	1212	60		ZX
GRP81152	10	1208+2	1209+3	1223	S11	E04	.140	16577	10.8	15	-N						
KANZ	10	1208	1209	1224	S11	E04	.140	16577	10.8	16	-N	2					
WEND	10	1210	1212	1222	S11	E05	.149	16577	10.9	12	-N		C	1212	97	1.0	
GRP81153	10	1212+1	1218 1225	1236	N22	W11	.472	16580	9.7	24	-N				70	.8	E
WEND	10	1212	1218	1240	N22	W11	.472	16580	9.7	28	-N	*	C	1218	68	.8	E
KANZ	10	1213	1225	1232	N23	W11	.486	16580	9.7	19	-N	*					
CATA	10	1220E	1220	12200	N22	W13	.484	16580	9.5		-N	*	P	1220	84	.9	
154 WEND	10	1220	1223	1229	N11	E62	.895	16590	15.2	9	-F		C	1223	56	1.2	ZX
155 KANZ	10	1405	1406	1409	N14	W13	.377	16581	9.6	4	-F	2					ZX
	10	1413	1531	NO FLARE PATROL													
156 HOLL	10	1753	1754	18020	S16	E63	.891	16592	15.5	90	-F	2	C		21		ZX
157 HUAN	10	1816	1818	1825	N30	E87	1.000	16598	17.3	9	-F	1	C	1818	15		D ZX
GRP81158	10	1835	1917	2140	N20	W35	.668	16572	8.1	185	1N						IUZ
HUAN	10	1835		19210	N20	W35	.668	16572	8.1	460	1N	*	P	1900	280	3.8	U
HOLL	10	1905E	1917U	19590	N19	W36	.672	16572	8.1	540	1N	*	C		208		Z U
CULG	10	1959E	1959E	2140	N24	W35	.696	16572	8.2	1010	2N	*	P	1959	560	7.8	I
159 HUAN	10	1902		1917	S16	E63	.891	16592	15.5	15	-N	1	C	1909	30	.6	ZX
160 HOLL	10	1909	1910	1915	N16	W52	.821	16566	6.9	6	-F	*	C		35		ZX
	10	1326	1332	NO FLARE PATROL													
161 HOLL	10	1934	1943	1946	S14	E62	.882	16592	15.5	12	-F	1	C		14		ZX
162 CULG	10	2107	2110	2115	N26	E47	.814	16588	14.4	8	-F		C	2110	90	1.5	ZX
163 CULG	10	2110	2152	22010	S11	W01	.123	16577	10.8	510	1N		P	2152	300	3.0	K ZX
164 CULG	10	2124	2127	2132	S16	E61	.875	16592	15.5	8	-F		C	2127	80	1.6	ZX
	10	2201	2210	NO FLARE PATROL													
165 CULG	10	2213	2215	2248	S10	W01	.106	16577	10.9	35	1N		C	2215	220	2.2	L ZX
166 CULG	10	2304	2307	2313	N17	W33	.626	16580	8.5	9	-F		C	2307	90	1.2	ZX
167 YUNN	11	0503E	0503	0505	S10	W04	.123	16577	10.9	20	-N		C		173	1.7	ZX
168 CULG	11	0538	0541	0550	N17	W37	.672	16580	8.5	12	-F		C	0541	70	.9	ZX
169 CULG	11	0544	0548	0610	S13	W47	.734	16568	7.7	26	-F		C	0548	50	.7	F ZX
170 CULG	11	0612	0621	06320	S15	W12	.277	16577	10.4	200	-F		C	0621	60	.6	ZX
GRP81171	11	0652+1	0655+0	0715	N20	E35	.669	16587	13.9	23	-B				120	1.6	D
TACH	11	0652	0655	0706	N23	E33	.671	16587	13.8	14	-B		C	0655	88	1.2	D
YUNN	11	0653	0655	0724	N18	E38	.688	16587	14.1	31	1B		C		157	2.2	
172 CULG	11	0800	0810U	08360	N17	W63	.911	16566	6.6	360	?F		P	0810	170	3.8	U ZX
	IMP. 1 NO 1 YUNN																
GRP81173	11	0801	0804	0818	S13	W49	.757	16568	7.7	17	1B				180	2.8	
CULG	11	0801	0804	0822	S13	W51	.778	16568	7.5	21	1B		C	0804	260	4.2	
CATA	11	0805E	0805	0805D	S14	W49	.758	16568	7.7		-B	2	P	0805	84	1.3	
YUNN	11	0806E	0806	0813	S12	W49	.756	16568	7.7	70	1B		C		177	2.8	
174 CULG	11	0819	0819	0836	S18	W11	.302	16578	10.5	27	-F		C	0819	140	1.4	ZX

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS.		MEASUREMENTS			REMARKS	
					APPROX		CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY			COND	TYPE	TIME	MEAS. AREA	CORR AREA		
	DATE	START	MAX. PHASE	END	LAT.	MER. DIST.				MIN.				UT	Millionths of Disk	Sq. Deg.		
175 KHAR	11	0918E	0918	0930D	S14	W13	.273	16577	10.4	20D	-N		P	0910	130	1.4		ZX
GRP81176	11	0916+4	0917+3	0925	S12	W48	.744	16568	7.8	9	-N				120	1.8	D	
YUNN	11	0916	0918	0925	S12	W47	.733	16568	7.9	9	1N		C		161	2.4		
KHAR	11	0917E	0917	0922D	S12	W48	.744	16568	7.8	5D	-N		P	0917	110	1.7	D	
CATA	11	0920	0920	0925D	S14	W48	.747	16568	7.8	5D	-N	1	P	0920	84	1.3		
177 KHAR	11	1000F		1010D	N18	W14	.440	16581	10.4	10D	-F		V				DT	ZX
GRP81178	11	1002+3	1006	1018	S12	W09	.286	16577	10.7	16	-N						E	
KHAR	11	1002E		1011D	S13	W10	.230	16577	10.7	9D	-F		V				E	
LVOV	11	1005	1006	1018	S11	W09	.135	16577	10.7	13	1N		P	1006	250	2.6	BE	
179 KHAR	11	1020E		1025D	N13	W17	.408	16581	10.2	5D	-F		V				DT	ZX
180 KHAR	11	1030E		1037D	N18	W20	.435	16581	9.9	7D	-F		V				DHT	ZX
181 KHAR	11	1117E		1143D	S12	W13	.219	16577	10.7	26D	-F		P					ZX
	11	1215	1239	NO FLARE PATROL														
182 RAMY	11	1248	1252	1345	N18	W38	.688	16580	8.7	57	-N	3	C		27			ZX
	11	1309	1337	NO FLARE PATROL														
183 HUAN	11	1348		1359	N25	E37	.722	16588	14.4	11	-F	1	C				E	ZX
GRP81184	11	1352+4	1355+3	1439	S11	W09	.195	16577	10.9	47	-N							
HUAN	11	1352	1355	1437D	S12	W10	.219	16577	10.8	45D	-N	2	P	1355	65	.7	E	
RAMY	11	1356	1358	1439	S11	W09	.195	16577	10.9	43	-B	3	C		166		FDE	
	11	1437	1438	NO FLARE PATROL														
185 RAMY	11	1444	1448	1505	N15	W59	.879	16572	7.2	21	-F	3	C		34			ZX
	11	1451	1504	NO FLARE PATROL														
	11	1546	1616	NO FLARE PATROL														
	11	1623	1711	NO FLARE PATROL														
	11	1746	1749	NO FLARE PATROL														
	11	1819	1822	NO FLARE PATROL														
186 HUAN	11	1841		1852	N10	E45	.731	16590	15.2	11	-F	1	C					ZX
187 HUAN	11	1849		1933D	N15	W66	.928	16566	6.8	14D	-F	1	P				E	ZX
	11	1854	1857	NO FLARE PATROL														
	11	1903	1906	NO FLARE PATROL														
	11	2003	2015	NO FLARE PATROL														
	11	2018	0003	NO FLARE PATROL														
	12	0017	0022	NO FLARE PATROL														
188 CULG	12	0226	0227	0230	N09	W02	.231	16586	12.0	4	-F		C	0227	120	1.2		ZX
189 CULG	12	0227	0240	0300	N04	W28	.487		10.3	33	-F		C	0240	90	1.8		ZX
190 CULG	12	0256	0315	0336	S13	W59	.856	16568	7.7	40	?F		C	0315	160	2.9	K	ZX
	IMP.1 NO : YUNN MITK																	
191 YUNN	12	0257E	0257	0304	S12	W18	.333	16577	10.8	7D	-N		C		64	.7		ZX
192 YUNN	12	0258	0300	0310	N10	E40	.673	16590	15.1	12	-N		C		63	.8		ZX
GRP81193	12	0308+1	0312+1	0325+	N16	W71	.956	16566	6.8	17	1N						EIK	
CULG	12	0308	0313	0400	N27	W82	.996	16566	6.0	52	2N		C	0313	320		I	
YUNN	12	0309	0312	0325	N15	W72	.960	16566	6.7	16	1N		C		177		EK	
CULG	12	0311	0313	0330D	N16	W60	.873	16566	7.6	19D	1F		C	0313	120	2.4		
194 YUNN	12	0350	0352	0407	S18	E42	.686	16592	15.3	17	?N		C		157	2.2	EK	ZX
	IMP.1 NO : CULG MITK																	
195 YUNN	12	0355	0356	0401	S12	W18	.333	16577	10.8	6	?N		C		251	2.7		ZX
	IMP.1 NO : CULG MITK																	
196 CULG	12	0538	0533	0547	N14	W80	.383	16566	6.2	9	-F		C	0533	80			ZX
197 CULG	12	0627	0641	0655	N38	E67	.965	16598	17.3	28	?F		C	0641	140			ZX
	IMP.1 NO : YUNN																	

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS.		MEASUREMENTS			REMARKS
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX LON. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONG	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.	
GRP81198	12	0701+9	0711 0721	0728	S13	W61	.873	16568	7.7	27	-F						
CULG	12	0701	0721	0740	S13	W62	.881	16568	7.6	39	-F		C	0721	100	2.0	
YUNN	12	0713	0711	0716	S13	W63	.865	16568	7.8	6	-N		C		32	.6	
199 YUNN	12	0708	0711	0720	S13	W20	.368	16577	10.8	12	-N		C		64	.7	ZX
200 CULG	12	0709	0710	0716	N16	W80	.989	16566	6.3	7	-F		C	0710	70		ZX
201 YUNN	12	0726	0729	0735	N10	E38	.649	16590	15.2	9	-N		C		79	1.0	ZX
202 YUNN	12	0733	0740	0755	N20	W46	.780	16580	8.9	22	?N		C		145	2.3	ZX
	IMP.1 NO 1 CULG																
203 CULG	12	0754	0803	0820	N30	E60	.913	16538	16.8	26	-F		C	0803	100	2.0	ZX
	12	1014	1100	NO FLARE PATROL													
	12	1135	1133	NO FLARE PATROL													
204 WEND	12	1138E		1208	S13	W24	.427	16577	10.7	300	-N		P	1133	144	1.7	ZX
205 WEND	12	1153		13030	N20	W47	.789	16580	9.0	700	1N		C	1253	160	2.6	ZX
GRP81206	12	1155+1	1200+0	1210	S14	W60	.865	16568	8.0	15	-B				70	1.4	D
CATA	12	1155	1200	1210	S16	W61	.874	16568	7.9	15	-B	2	C	1200	56	1.1	
WEND	12	1156	1200	1210	S13	W60	.865	16568	8.0	14	-B		C	1200	90	1.9	D
	12	1257	1600	NO FLARE PATROL													
	12	1607	1700	NO FLARE PATROL													
207 RAMY	12	1805	1805	1831	N17	W49	.757	16580	9.1	26	-N	3	C		31		ZX
208 BIGB	12	1856	1907	1943	S13	E90	1.000	16601	19.5	47	2B		C	1907	240		ZX
209 RAMY	12	1917	1924	1936	N11	E31	.565	16590	15.1	19	-N	3	C		49		ZX
GRP81210	12	2001	2004	2017?	N18	W53	.836	16580	8.9	16	?N						FK
RAMY	12	2001	2004	2017	N17	W51	.816	16580	9.0	16	?N	3	C		27		
	IMP.S IMP.2																
CULG	12	2009E	2020	2102	N13	W55	.856	16580	8.7	530	2N		P	2020	380	6.8	FK
211 RAMY	12	2006	2008	2012	S17	W68	.925	16568	7.7	6	-F	3	C		15		ZX
212 CULG	12	2015E	2015E	20200	S32	E57	.866	16533	17.1	50	-F		P	2015	70	1.4	ZX
213 CULG	12	2026	2046	2115	S13	W72	.948	16568	7.5	49	?N		C	2046	140		F ZX
	IMP.1 NO 1 BIGB																
GRP81214	12	2200	2202 2203	2212	S10	E83	1.000	16601	19.6	12	-N						
HOLL	12	2200	2202	2210	S09	E89	1.000	16601	19.6	10	-F	2	C				
BIGB	12	2205E	2209E	2213	S12	E90	1.000	16601	19.7	80	1B		P	2209	120		
215 HOLL	12	2228	2230	2243	N17	W56	.859	16580	8.7	21	-N	2	C		33		F ZX
216 CULG	12	2325	2327	2338	S12	E90	1.000	16601	19.7	13	-F		C	2327	60		ZX
217 BIGB	12	2348E	2352	23540	S12	E90	1.000	16601	19.7	60	?B		P	2352	100		ZX
	IMP.1 NO 1 CULG																
218 CULG	13	0018	0022	0034	N17	W63	.912	16580	8.3	16	-F		C	0022	70	1.7	ZX
	13	0025	0030	NO FLARE PATROL													
219 CULG	13	0057	01110	01170	N17	W64	.918	16580	8.2	200	-F		P	0111	70	1.7	ZX
	13	0100	0108	NO FLARE PATROL													
220 YUNN	13	0215	0218	0236	N20	W56	.867	16580	8.9	21	-N		C		63	1.3	EK ZX
221 YUNN	13	0255	0303	0316	S15	W31	.534	16577	10.8	21	-N		C		79	.9	EF ZX
222 YUNN	13	0321	0327	0410	N20	W56	.867	16580	8.9	49	2B		C		299	6.8	ZX
GRP81223	13	0435+6	0440 0448	0504	S10	E11	.213	16591	14.0	29	-N						G
YUNN	13	0435	0440	0500	S11	E11	.221	16591	14.0	25	-N		C		113	1.2	
PURP	13	0441	0448	0507	S10	E11	.213	16591	14.0	26	1F		C				G

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	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		COND.	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.	
224 YUNN	13	0503E	0503	0508	N13	W54	.848	16580	3.2	50	?N		C		145	2.8	ZX
	IMP.1 NO : PURP																
225 CULG	13	0640	0651	0710	S18	E26	.483	16532	15.2	30	?F		C	0651	220	2.4	ZX
	IMP.1 NO : YUNN PURP																
226 CULG	13	J650E	0653	0659	N16	W67	.935	16580	8.3	90	-F		P	0653	90	2.0	ZX
227 CULG	13	0651	0651	0656	S11	W76	.368	16568	7.6	5	-F		C	0651	20		ZX
228 CULG	13	0706	0726	J745	S17	W77	.972	16568	7.5	39	?N		C	0726	250		ZX
	IMP.1 NO : YUNN PURP																
GRP81223	13	0745E	0745	0805	N20	W56	.867	16580	3.1	20	1N						EK
YUNN	13	0745E	0745	0755	N13	W53	.840	16580	9.3	100	1N		C		129	2.5	E
TELV	13	J748E		J815	N21	W63	.899	16580	8.8	270	-N	2			61	1.3	EK
GRP81230	13	0811+9	0818 0825	1021	N20	W58	.882	16580	9.0	130	-B						EK
KANZ	13	0811E		0949	N19	W59	.887	16580	8.9	980	-N	1					
TELV	13	J815	0818	J954D	N21	W63	.899	16580	8.8	990	-B	2			82	1.7	EK
YUNN	13	0820	0825	0845	N17	W53	.834	16580	9.4	25	1B		C		193	3.5	
WEND	13	0855E		1035	N13	W58	.880	16580	3.0	1000	-N		C	0855	100	2.1	F
KHAR	13	0913E		10400	N22	W58	.887	16580	9.0	870	1F		P	0913	180	3.6	E
KANZ	13	1000	1316	1335	N20	W57	.875	16580	9.1	35	-N	1					
231 WEND	13	0917	0925	0945	S23	E35	.624	16593	16.0	28	-N		C	0925	72	1.0	ZX
232 WEND	13	1001	1004	1016	N32	E48	.851	16598	17.0	15	-F		C	1004	63	1.1	ZX
GRP81233	13	1045+3	1122+2	11321	S13	E80	.983	16601	19.4	47	-N						
WEND	13	1045	1124	1336	S13	E81	.986	16601	19.5	171	1B		C	1124	56		
KHAR	13	1047E		11270	S14	E80	.982	16601	13.4	480	-F		P				
KANZ	13	1048	1122	1132	S13	E80	.983	16601	19.5	44	-B	2					
GRP81234	13	1105+1	1109+1	1121	S13	W75	.963	16568	7.8	16	-B						D
WEND	13	1105	1109	1124	S13	W75	.963	16568	7.8	19	-B		C	1109	38		
KANZ	13	1106	1110	1118	S14	W75	.963	16568	7.8	12	-B	2					
KHAR	13	1107E	1110	11170	S13	W77	.972	16568	7.7	100	-B		P				D
235 WEND	13	1130	1217	1250	N16	W41	.712	16581	10.4	80	?N		C	1217	156	2.2	ZX
	IMP.1 NC : KANZ																
GRP81236	13	1154	1229+2	1251	N17	W62	.905	16580	8.8	57	-N				60	1.4	F
KANZ	13	1154	1230	1250	N17	W56	.860	16580	9.3	56	-N	1					F
WEND	13	1212E	1223	12460	N13	W62	.908	16580	8.3	340	-N		C	1223	75	1.7	
RAMY	13	1230E	1231	1251	N17	W64	.918	16580	8.7	210	-N	2	C		52		
GRP81237	13	1317	1336+1	1353	N17	W62	.905	16580	8.9	36	-N				45	1.0	
KANZ	13	1317	1337	1353	N17	W62	.905	16580	8.9	36	-N	1					
RAMY	13	1321E	1336	1404	N16	W62	.903	16580	8.3	430	-N	2	C		37		
WEND	13	1334	1336	1353	N19	W62	.908	16580	8.9	19	-N		C	1336	50	1.2	
	13	1422	1442	NO FLARE PATROL													
238 RAMY	13	1443	1450	1505	N17	W61	.838	16580	9.0	16	-N	3	C		34		ZX
	13	1534	1539	NO FLARE PATROL													
239 RAMY	13	1511	1529	1546	N26	W31	.678	16585	11.3	35	-F	3	C		24		ZX
240 RAMY	13	1528	1531	1533	N15	W63	.889	16580	8.9	11	-F	3	C		14		ZX
241 RAMY	13	1546	1558	1612	N16	W63	.910	16580	8.9	26	-N	3	C		27		ZX
GRP81242	13	1615+3	1622+0	1653	S12	E77	.972	16601	13.5	38	1B						
RAMY	13	1615	1622	1704	S12	E74	.959	16601	19.2	49	2B	3	C				
BIGB	13	1618	1622	1653	S12	E77	.972	16601	19.5	35	1B		C	1622	200		
HUAN	13	1640E		1648	S13	E77	.972	16601	19.5	80	-N	1	P	1642	60		
GRP81243	13	1618+1	1622+3	1640	S13	W80	.983	16568	7.7	22	1B				170		
BIGB	13	1618	1622	1640	S13	W80	.983	16568	7.7	22	1B		C	1622	150		
RAMY	13	1619	1625	1639	S18	W69	.932	16568	8.5	20	1B	3	C		199		
HUAN	13	1620E		16210	S13	W80	.983	16568	7.7	10	-F	1	P				
RAMY	13	1621	1625	1640	S15	W79	.973	16568	7.8	19	1B	3	C				
244 RAMY	13	1728	1730	1833	N26	W32	.687	16585	11.3	65	-F	3	C		32		ZX

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS.		MEASUREMENTS			REMARKS
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX LON. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONF.	TYPE	TIME UT	MEAS AREA Millionths of Disk	CORR AREA .Sq. Deg.	
GRP81245	13	1751+0	1801	1908	S13	E74	.959	16601	19.3	77	-N						F
HUAN	13	1751		1752D	S13	E77	.372	16601	19.5	1D	-F	1	P	1751	30		
RAMY	13	1751	1801	1308	S14	E71	.943	16601	19.1	77	-N	3	C		35		F
GRP81246	13	1806+7	1815 1837	2040:	N15	W65	.922	16580	8.9	154	1B						
RAMY	13	1806	1815	1820D	N15	W65	.922	16580	8.9	14D	-B	3	C		65		
BIGB	13	1813	1916	2040D	N17	W65	.925	16580	8.9	147D	2B		P	1916	330		
HOLL	13	1817E	1837U	1902D	N13	W65	.919	1658J	8.9	45D	-B	2	C		187		
247 HOLL	13	1937	1940	1954	S09	E77	.972	16601	19.6	17	-F	2	C				ZX
	13	2044	2051	NO FLARE PATROL													
	13	2057	2126	NO FLARE PATROL													
	13	2218	2241	NO FLARE PATROL													
248 CULG	13	2223E	2223E	2247	N20	W72	.365	16580	8.5	24D	1N		P	2223	200		ZX
	13	2328	2336	NO FLARE PATROL													
	13	24JJ	0002	NO FLARE PATROL													
	14	0023	0025	NO FLARE PATROL													
GRP81249	14	0131+0	0138+2	0143	N18	W69	.943	16580	8.3	18	1F						
PURP	14	0131	0138	J146	N17	W68	.942	1658J	9.J	15	1F		C				
CULG	14	0131E	0140U	01510	N20	W70	.956	16580	8.8	20D	1N		P	0140	180		
250 PURP	14	0138	0143	0146	S18	E20	.404	16592	15.6	8	-F		P				ZX
GRP81251	14	0154+0	0159+1 0210	J236	S1J	W44	.694	16577	10.8	42	1N						I
CULG	14	0139	0210	0236D	S10	W45	.706	16577	10.7	57D	2N		P	0210	380	5.3	FI
PURP	14	0154	0159	0241	S14	W44	.700	16577	10.8	47	1N		C				
YUNN	14	0154	0200	0230	S10	W41	.656	16577	11.0	36	-F		C		96	1.3	E
252 PURP	14	0207	0214	0223	S18	E20	.404	16592	15.6	16	?N		C				ZX
	IMP.1 NO : YUNN CULG																
253 CULG	14	J4J1E	J4J3U	J411	S11	W52	.787	16577	10.3	10D	-F		P	0403	40	.6	ZX
254 CULG	14	0431	0436	0457D	N24	W68	.951	16580	9.1	26D	-F		P	0436	80		K ZX
255 YUNN	14	0453E	0453	0500	N23	W37	.752	16585	11.4	7D	-F		C		64	1.0	ZX
256 CULG	14	0520E	0533	0545	S10	W53	.797	16577	10.2	25D	-N		C	0533	50	.8	KF ZX
GRP81257	14	0618+8	0621+5	0645	N20	W72	.365	16580	8.3	27	1N				130		
CULG	14	0618	0623	0645	N20	W76	.380	16580	8.6	27	1N		C	0623	220		
YUNN	14	J621E	0621	J631	N19	W69	.950	1658J	9.1	10D	1B		C		161		
PURP	14	0626	0626	0648	N20	W72	.965	16580	8.9	22	1N		C				
258 CULG	14	0717	0721	0726	S10	W54	.807	16577	10.3	9	-N		C	0721	50	.8	ZX
259 CULG	14	J8J1	J821	J826	N2J	W75	.976	1658J	8.7	27	?F		C	J821	200		FI ZX
	IMP.2 NO : YUNN KANZ																
260 CULG	14	0822	0832	0837D	S13	W90	1.000	16568	7.6	15D	-F		P	0832	50		ZX
GRP81261	14	0930+2	J932	J939!	S12	W53	.798	16577	10.4	9	-N						
WEND	14	0930E		0940D	S12	W54	.808	16577	10.3	10D	-N		C	0932	50	.9	
KANZ	14	0932	0932	0933	S13	W55	.818	16577	10.3	7	-F	1					
WEND	14	0936		1146D	S12	W47	.732	16577	10.3	130D	1N		C	0953	150	2.3	
GRP81262	14	1058+1	1103+1	1108	S12	W54	.808	16577	10.4	10	-N						
WEND	14	1058	1104	1109	S12	W54	.808	16577	10.4	11	-N		C	1104	47	.8	
KANZ	14	1059	1103	1106	S13	W55	.818	16577	10.3	7	-N	1					
263 WEND	14	1111		1214D	N19	W70	.955	16580	9.2	63D	-N		C	1130	50		ZX
GRP81264	14	1218+2	1222+2	1242	S12	W55	.818	16577	10.4	24	-N						
WEND	14	1218	1224	1249	S11	W51	.776	16577	10.7	31	1N		C	1224	150	2.5	
KANZ	14	1220	1224	1242	S12	W55	.818	16577	10.4	22	-B	2					
RAMY	14	122J	1222	1231	S13	W55	.818	16577	10.4	11	-N	3	C		45		

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS.		MEASUREMENTS			REMARKS
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMR. DAY	MIN.		COND.	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR. AREA Sq. Deg.	
GRP81265	14	1304+9	1304 1316+3	1328	S13	W57	.837	16577	10.3	24	-B				60	1.1	
KANZ	14	1304	1304	1327	S12	W49	.755	16577	10.9	23	-N	2					
RAMY	14	1313	1319	1328	S14	W58	.847	16577	10.2	15	-B	3	C		60		
KANZ	14	1316	1316	1327	S14	W59	.856	16577	10.1	11	-B	2					D
WENO	14	1319E		1331	S12	W57	.837	16577	10.3	120	-N		C	1321	63	1.1	
266 WENO	14	1321		14210	N19	W75	.976	16583	8.9	600	-N	*	C	1343	58		ZX
267 WENO	14	1321		14250	N10	E80	.988	16602	20.6	640	-N		C	1342	63		ZX
	14	1425	1433	NO FLARE PATROL													
268 RAMY	14	1443	1446	1449	N09	E02	.235	16590	14.8	6	-F	3	C		22		ZX
	14	1453	1501	NO FLARE PATROL													
GRP81269	14	1657>9	1712	1724	N18	E01	.250	16590	14.8	27	-F						
RAMY	14	1657	1712	1727	N09	E02	.235	16590	14.9	30	-F	3	C		40		
HOLL	14	1712	1721	1721	N11	E00	.266	16530	14.7	9	-F	3	C		21		
270 HOLL	14	1840	1847	1901	N18	W53	.837	16581	10.8	21	-F	3	C		21		F ZX
271 HOLL	14	1906	1915	1929	N14	W58	.870	16581	10.4	23	-F	3	C		18		ZX
	14	1913	1948	NO FLARE PATROL													
272 CULG	14	2009E	2023U	23450	S13	W55	.818	16577	10.7	360	?N		P	2023	180	3.2	ZX
	IMP.1 NO : HOLL																
273 HOLL	14	2037	2043	2135	S19	E15	.353	16593	16.0	58	-N	3	C		145		F ZX
274 HOLL	14	2132	2137	2212	N11	W01	.267	16590	14.8	40	-F	3	C		42		ZX
GRP81275	14	2219+1	2222+0	2255	N10	W01	.250	16590	14.9	36	-F				50	.5	F
CULG	14	2219	2222	2243	N10	E00	.249	16530	14.3	30	-F		C	2222	50	.5	T
HOLL	14	2220	2222	2300	N11	W02	.268	16590	14.8	40	-F	3	C		61		F
276 CULG	14	2221	2230	2258	S13	E46	.722	16600	18.4	37	-F		C	2230	40	.6	ZX
277 CULG	14	2237	2242	2318	N13	W88	1.000	16588	8.3	41	?N		C	2242	140		ZX
	IMP.1 NO : HOLL																
GRP81278	14	2341>9	2347 2413	0032	S15	E06	.210	16532	15.4	51	-F						L
PURP	15	0012	0013	0030	S15	E06	.208	16592	15.5	18	-F		C				
PURP	15	0030	0039	0101	S20	E05	.279	16592	15.4	31	-F		P				
CULG	14	2341	2347	0032	S13	E08	.202	16592	15.6	51	1N		C	2347	200		L
279 CULG	14	2357	2401	0014	S12	E62	.881	16601	13.6	17	-N		C	2401	60	1.3	ZX
GRP81280	15	0425+8	0435+1	0454	N18	W84	.997	16580	8.9	29	-N						
PURP	15	0425	0436	0458	N20	W90	1.000	16580	8.4	33	1N		C				
YUNN	15	0433	0435	0450	N17	W78	.985	16580	9.3	17	-N		C		32		
GRP81281	15	0454	0503+5	0543	N25	W59	.902	16585	10.8	46	2N				370	8.2	FIU
PURP	15	0454	0505	0531	N25	W59	.902	16585	10.8	37	2N		C		415	9.5	
YUNN	15	0459E	0503	0540	N26	W58	.898	16585	10.9	410	2B		C		225	5.1	EF
CULG	15	0500E	0508	0721	N25	W61	.915	16585	10.6	1410	2N		P	0508	460	10.3	UFI
	15	1143	1338	NO FLARE PATROL													
	15	1336	1338	NO FLARE PATROL													
	15	1345	1357	NO FLARE PATROL													
282 RAMY	15	1619	1621	1623	N08	W13	.310	16590	14.7	4	-F	3	C		28		ZX
283 RAMY	15	1700	1701	1706	N26	W57	.891	16585	11.4	6	-F	3	C		16		ZX
	15	2112	2113	NO FLARE PATROL													
GRP81284	16	0014+7	0022+3	0036	N14	E68	.935	16602	21.1	22	-N						
CULG	16	0014	0025	0049	N08	E65	.914	16602	20.9	35	1N		C	0025	100	2.3	T
PURP	16	0021	0022	0023	N13	E71	.955	16602	21.3	2	-F		C				
GRP81285	16	0030	0033+0	0053	S21	W01	.282	16593	15.9	23	-N						L
CULG	16	0030	0033	0102U	S21	W01	.282	16593	15.9	320	-N		C	0033	140	1.5	L
YUNN	16	0033E	0033	0044	S21	W02	.284	16593	15.9	110	-N		C		64	.7	

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OBSERVATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		COND	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.		
GRP81286	16	0043+7	0045+5	0108	S15	E46	.724	16601	19.5	25	-N							
YUNN	16	0043	0045	0100	S16	E46	.726	16601	19.5	17	-N		C		80	1.2		
PURP	16	0050	0050	0116	S15	E46	.724	16601	19.5	26	1N		P					
GRP81287	16	0123+6	0127+3	0140	S13	E44	.697	16601	19.4	17	-N						EH	
YUNN	16	0123	0127	0140	S12	E42	.671	16601	19.2	17	-N		C		120	1.7	EH	
PURP	16	0129	0130	0140	S14	E46	.722	16601	19.5	11	1N		C					
288 CULG	16	0133	0140	0149	N08	E68	.934	16602	21.2	16	-F		C	0140	60	.9	T	ZX
289 YUNN	16	0154	0155	0156	S16	E46	.726	16601	19.5	2	-N		C		96	1.4		ZX
290 YUNN	16	0342	0346	0355	N08	W18	.374	16590	14.8	13	-N		C		48	.5		ZX
GRP81291	16	0343>9	0355 0410	0425	N10	E69	.941	16602	21.3	42	-F						U	
CULG	16	0343	0355	0434	N10	E74	.967	16602	21.7	51	1F		C	0355	100	2.5	TU	
PURP	16	0407	0410	0416	N11	E65	.917	16602	21.0	9	-F		C					
292 CULG	16	0509	0514	0526	S12	W87	.998	16577	9.7	17	-F		C	0514	30			ZX
293 ABST	16	0624	0626	0630	N08	W31	.551	16589	13.9	6	-F		C	0626	87	1.0	DJ	ZX
294 ABST	16	0718	0719	0726	S15	E45	.712	16601	19.7	8	-F		C	0719	131	1.9	FJ	ZX
295 CULG	16	0744	0818	0837	N27	W72	.971	16585	10.3	53	-N		C	0818	50			ZX
296 CULG	16	0805	0813	0831	S17	E23	.434	16600	18.1	26	-N		C	0813	70	.8	F	ZX
GRP81297	16	0814+3	0821+5	0905	N20	W29	.611	16587	14.2	51	1B				180	2.3	EJU	
ABST	16	0814	0824	0850	N13	W30	.613	16587	14.1	36	1N		C	0824	174	2.4	EJ	
CULG	16	0817	0826	0837D	N20	W29	.611	16587	14.2	20D	1B		C	0826	250	3.1	U	
TELV	16	0817	0821	0956	N20	W30	.621	16587	14.1	99	-B	2			122	1.5	U	
YUNN	16	0845E		0905	N20	W29	.611	16587	14.2	20D	-N		C	0845	142	1.8		
298 YUNN	16	0905	0910	0915	S16	W12	.282	16592	15.5	10	-N		C		110	1.2		ZX
299 YUNN	16	0933	0937	0958	N13	E66	.926	16602	21.3	25	1N		C		142			ZX
300 YUNN	16	1013	1018	1025	N10	E56	.845	16602	20.6	12	-N		C	1013	80	1.4		ZX
301 RAMY	16	1351	1359	1411	S15	E41	.664	16601	19.7	20	-N	3	C		96		F	ZX
302 RAMY	16	1937	1938	1943	N24	W75	.979	16585	11.2	6	-N	3	C					ZX
303 RAMY	16	1951	1951U	2001	S14	E35	.584	16601	19.5	10	-N	3	C		25			ZX
GRP81304	16	2040	2043+2	2055	N27	W77	.987	16585	11.1	15	-F							
CULG	16	2040	2045	2053	N28	W80	.993	16585	10.9	13	-N		C	2045	40			
HOLL	16	2043E	2043U	2057D	N27	W74	.978	16585	11.3	14D	-F	2	C		14			
GRP81305	16	2113E	2201 2225	0022	S17	E17	.354	16600	18.2	187	-F						LU	
CULG	16	2113E	2201	0020	S18	E18	.376	16600	18.2	187D	1F		C	2201	280	3.1	L	
HOLL	16	2157E	2225U	2345D	S16	E17	.345	16600	18.2	108D	-F	2	C		42		U	
306 CULG	16	2343	2348	2357	S12	E32	.537	16601	19.4	14	*-F		C	2348	30	.3		ZX
307 CULG	17	0100	0111	0123	S10	W88	.999	16577	10.4	23	-F		C	0111	40			ZX
308 CULG	17	0130	0143	0215	N15	E67	.335	16602	22.1	45	?N		C	0143	180			ZX
	IMP.1 NO : MITK PURP																	
309 CULG	17	0529	0543	0600	N15	W33	.618	16590	14.8	31	-F		C	0543	150	1.9	FL	ZX
310 ABST	17	0614	0616	0625	N11	E55	.838	16602	21.4	11	?N		C	0616	131	2.4	DJ	ZX
	IMP.1 NO : PURP CULG MITK																	
311 CULG	17	0802	0807	0816	S25	W86	.995	16578	10.3	14	?N		C	0807	50		G	ZX
	IMP.1 NO : ABST YUNN CAIA																	
312 WEND	17	1119	1133	1205	S17	W26	.474	16592	15.5	46	-N		C	1133	44	.5	E	ZX
313 WEND	17	1211E		1247D	S17	W27	.487	16592	15.5	36D	-N		C	1232	19	.2		ZX

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS.		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX LONG. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONF.	TYPE	TIME UT	MEAS. AREA Mill of Disk	CORR AREA Sq. Deg.		
GRP81314	17	1216>9	1327+1	1339	S15	E28	.491	16601	19.6	83	-F				60	.7		
WEND	17	1216E	1327	1342D	S16	E33	.563	16601	20.0	86D	-F		C	1327	56	.7		
ATHN	17	1325	1328	1336	S15	E23	.42J	166J1	19.3	11	-N	3	V	1328	66	.7		
315 RAMY	17	1314	1315	1326	N11	E43	.714	16602	20.8	12	-N	3	C		18			ZX
316 HOLL	17	1753	1757	1854	S33	W06	.482	16593	17.3	61	-F	3	C		134		U	ZX
317 RAMY	17	1831	1831	1844	N16	W52	.824	16587	13.9	13	-F	3	C		17			ZX
318 HOLL	17	1919	1913	1934	S13	W30	.538	16592	15.6	15	-N	3	C		35		F	ZX
319 CULG	17	2134	2141	22J3	N12	E53	.822	16602	21.9	29	-N		C	2141	10J	1.7		ZX
320 CULG	17	2258	2305	2319	N09	W58	.861	16589	13.6	21	-N		C	2305	30	.6	H	ZX
321 YUNN	18	0113	0117	0123	S17	W34	.580	16592	15.5	10	-F		C		80	1.0		ZX
322 CULG	18	J138	0143	0151	N08	W59	.868	16589	13.6	13	-B		C	0143	40	.8	H	ZX
323 CULG	18	0213	0223	0244	N32	W15	.636	16598	17.0	25	-F		C	0223	80	1.0		ZX
324 CULG	18	0448	0453	J513U	NJ8	W60	.876	16589	13.7	25D	-F		C	J453	80	1.6	FH	ZX
325 YUNN	18	0629	0636	0655	N09	W53	.815	16589	14.3	26	?N		C		129	2.3		ZX
	IMP.1 NO : PURP CULG MITK																	
326 YUNN	18	J633	J635	J638	N33	W14	.644	16596	17.2	5	?N		C		241	3.2		ZX
	IMP.1 NO : PURP CULG MITK																	
327 YUNN	18	0635	0636	0644	S10	E43	.753	16613	21.3	9	?N		C		161	2.5		ZX
	IMP.1 NO : PURP CULG MITK																	
328 YUNN	18	0925E	0925	0325D	S16	E16	.330	16601	18.6		-N		P		161	1.7		ZX
329 ATHN	18	1057	1100	1108	N15	E43	.731	16602	21.7	11	-N	3	V	110J	66	.9		ZX
330 WEND	18	1336E		1356D	S18	E03	.233	16601	18.8	20D	-N		C	1340	63	.7		ZX
331 RAMY	18	1451	1453	1503	S16	W41	.666	16592	15.5	12	-N	3	C		24			ZX
332 RAMY	18	1732	1736	1747	S18	W42	.683	16592	15.6	15	-F	3	C		30			ZX
333 RAMY	18	1746	1751	1755	N15	E59	.881	16607	23.2	9	-N	3	C		30			ZX
334 RAMY	18	1844	1859	1906	N15	E59	.881	16607	23.2	22	-N	3	C		34			ZX
GRP81335	18	1952	1954 2025	2136+1	S13	W02	.146	16601	18.7	104	?N						FSUN	
PASA	18	1952	1954	2136D	S15	W02	.180	16601	18.7	104D	?N	1			150	1.5	H	
	IMP.S IMP.2																	
CULG	18	2024E	2025U	2121D	S12	W02	.129	16601	18.7	57D	2N		C	2025	550	5.6	SFU	
336 CULG	18	2044	2050	2112	N18	E33	.704	16602	21.8	28	?N		C	2050	160	2.1	L	ZX
	IMP.1 NO : PASA																	
337 HUAN	18	2125E		2137	N16	E37	.671	16602	21.7	12D	-F	1	P	2127	15	.2	D	ZX
338 YUNN	19	0204	0216	0300	N32	W28	.714	16598	17.3	56	-N		C		96	1.4	E	ZX
GRP81339	19	0451+7	0502+6	0520	S14	E04	.172	16601	19.5	29	-F						E	
CULG	19	0451	0508U	0524D	S14	E06	.188	16601	19.7	33D	-F		P	0508	80	.8		
YUNN	19	0458	0502	0515	S14	E02	.161	16601	19.4	17	-F		C		193	1.9	E	
340 YUNN	19	J534E	0534	0540	N14	E26	.530	16602	21.2	6D	-N		C		80	.9		ZX
341 YUNN	19	0735	0733	0800	N11	E43	.780	16607	23.0	25	?B		C		129	2.0		ZX
	IMP.1 NO : TACH																	
GRP81342	19	0910	0910	0931	N14	E23	.435	16602	21.1	21	1B						H	
KANZ	19	0910	0910	0932	N14	E23	.435	16602	21.1	22	1B	2					H	
WEND	19	J911E		J93J	N14	E24	.506	16602	21.2	19D	-N		C	J911	130	1.5	B	
GRP81343	19	1006+1	1011	1029	S21	W27	.511	16600	17.4	23	-F						G	
WEND	19	1006		1031	S21	W27	.511	16600	17.4	25	-N		C	1012	56	.7	G	
KANZ	19	1007	1011	1027	S21	W28	.523	16600	17.3	20	-F	2					G	

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS.		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		COND.	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.		
344 KANZ	19	1218	1222	1233	N13	E23	.485	16602	21.2	15	-N	2					E	ZX
	19	1319	1353	NO FLARE PATROL														
345 WEND	19	1359	1403	1415	S32	W33	.657	16599	17.1	16	-F		C	1403	37	.5	G	ZX
346 WEND	19	1425	1426	1445	N14	E22	.483	16602	21.3	20	-B		C	1426	69	.8	E	ZX
347 WEND	19	1510		1513D	S14	W56	.828	16592	15.4	90	-F		C	1510	34	.6	D	ZX
348 HOLL	19	1520	1524	1531	S33	W30	.638	16599	17.4	11	-F	2	C		46		F	ZX
349 HOLL	19	1702	1705	1733	N14	E13	.450	16602	21.1	31	-N	3	C		140		F	ZX
350 HOLL	19	1810	1810	1828	S13	W05	.164	16601	19.4	18	-N	3	C		59		F	ZX
GRP81351	19	1905+1	1910	1928	N15	E18	.450	16602	21.1	23	-F							
HUAN	19	1905E		1918D	N15	E18	.450	16602	21.1	13D	-F	1	P				E	
HOLL	19	1906	1910	1928	N15	E13	.460	16602	21.2	22	-N	3	C		64		F	
352 CULG	19	2339	2347	0010	S15	W62	.881	16592	15.3	31	-F		C	2347	80	1.6		ZX
GRP81353	20	0048>3	0100+2	0103	N12	W71	.354	16590	14.7	21	-N						F	
CULG	20	0048	01000	0108D	N12	W73	.364	16590	14.6	20D	1N		P	0100	180		F	
YUNN	20	0059	0102	0104	N12	W69	.944	16593	14.9	10	-N		C		64			
354 CULG	20	0235	0237	0239	S18	W20	.398	16600	18.6	4	-F		C	0237	40	.4		ZX
355 CULG	20	0248	0322	0334	S10	E24	.411	16613	21.3	46	-F		C	0322	180	2.0	KF	ZX
356 YUNN	20	0700E	0700	0705	S12	W14	.267	16601	19.2	50	-F		C		129	1.3		ZX
357 CULG	20	0728	0733	0750	S10	E23	.396	16613	22.0	22	-F		C	0733	130	1.4		ZX
358 CULG	20	0731	0743	0803	S19	W18	.382	16601	19.0	32	-N		C	0743	180	2.0	S	ZX
359 WEND	20	0846E		0941	S15	W10	.242	16601	19.6	550	-N		C	0846	137	1.5	E	ZX
	20	1305	1313	NO FLARE PATROL														
	20	1314	1656	NO FLARE PATROL														
	20	1713	1739	NO FLARE PATROL														
	20	1746	1755	NO FLARE PATROL														
	20	1804	1903	NO FLARE PATROL														
	20	1928	2021	NO FLARE PATROL														
360 CULG	20	2112	2114	2128	N18	E12	.437	16602	21.8	16	1F		C	2114	190	2.1		ZX
	20	2245	2302	NO FLARE PATROL														
361 CULG	20	2313	2320D	2333D	S17	E16	.338	16604	22.2	20D	-N		C	2320	30	.3	L	ZX
362 PURP	21	0256	0256	0256D	S16	E13	.288	16604	22.1		-N		P					ZX
363 YUNN	21	0535	0533	0550	S27	E12	.418	0	22.1	15	?B		C		193	2.0	JT	ZX
	IMP. 1 NO 1 PURP																	
GRP81364	21	0824	0831	0925	N16	W02	.362	16602	21.2	61	1N				330	3.5	EK	
			0854+0															
YUNN	21	0824	0831	0920	N16	W02	.362	16602	21.2	56	1N		C		417	4.5	EK	
WEND	21	0828E	0854	0931	N15	W02	.346	16602	21.2	63D	1N		C	0854	440	4.7		
CATA	21	0845E	0845	0845D	N16	W03	.364	16602	21.1		2B	2	P	0845	562	6.2		
ATHN	21	0851E	0854	0913	N16	E01	.361	16602	21.4	28D	1N	3	V	0854	228	2.4		
MONT	21	0910E	0910	0923D	N18	W03	.396	16602	21.2	13D	-N		C	0910	100		B	
KHAR	21	0932E		0955D	N19	W04	.414	16602	21.1	23D	-N		P				BE	
365 KHAR	21	1005E		1018D	S17	E08	.246	16604	22.0	13D	-F		P				D	ZX
366 KHAR	21	1042E		1045D	N13	W33	.315	16602	21.2	3D	-F		P				D	ZX
367 KHAR	21	1052E		1058D	S18	W35	.595	16601	18.8	6D	-F		P				D	ZX
GRP81368	21	1055+0	1111	1135	N12	W04	.302	16602	21.2	40	-F						D	
WEND	21	1055	1111	1135	N12	W04	.302	16602	21.2	4D	-F		C	1111	53	.6		
KHAR	21	1055E		1125D	N13	W05	.322	16602	21.1	30D	-F		P				D	
369 KHAR	21	1055E		1058D	S17	E08	.246	16604	22.1	3D	-F	*	P				D	ZX

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS.		MEASUREMENTS			REMARKS
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONF.	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.	
GRP81373	21	1157+3	1201+5	1227	N12	W05	.306	16602	21.1	30	-N				110	1.1	
KHAR	21	1157E	1202	12120	N12	W06	.311	16602	21.0	150	-N		P	1202	120	1.3	E
WEND	21	1158	1206	1227	N13	W04	.318	16602	21.2	23	-N		C	1206	112	1.2	
RAMY	21	1200	1201	1226	N12	W05	.306	16602	21.1	26	-N	3	C		47		F
371 RAMY	21	1543	1551	1601	S35	E56	.827	16609	25.9	18	-N	3	C		71		ZX
372 RAMY	21	1808	1809	1826	S16	E08	.232	16604	22.4	18	-N	3	C		27		F ZX
GRP81373	21	2026+2	2028+0	2041	S18	W37	.621	16601	19.1	15	-F				50	.6	F
BIGB	21	2026	2028	2043	S17	W37	.617	16601	19.1	17	-N		C	2028	50	.6	
RAMY	21	2028	2028	2039	S19	W38	.637	16601	19.0	11	-F	3	C		61		F
374 HOLL	21	2304	2309	2332D	S16	E08	.214	16604	22.4	28D	-F	3	C		46		ZX
375 YUNN	22	0032E	0035	0047	S17	E01	.205	16604	22.1	15D	-N		C		48	.5	ZX
376 YUNN	22	0130	0134	0144	N12	W14	.377	16602	21.0	14	-N		C		48	.5	ZX
377 YUNN	22	0148E	0148	0214	S17	E00	.204	16604	22.1	26D	-N		C		96	1.0	ZX
378 YUNN	22	0221	0224	0250	S17	E00	.204	16604	22.1	29	-N		C		80	.8	ZX
379 YUNN	22	0305	0309	0345	S17	E00	.204	16604	22.1	40	-N		C		123	1.3	ZX
380 YUNN	22	0453	0456	0510	S17	W02	.237	16604	22.1	17	-N		C		113	1.1	ZX
381 YUNN	22	0545	0547	0617	S16	W02	.130	16604	22.1	32	-F		C		80	.8	ZX
GRP81382	22	0633+2	0637+0	0650	S16	W03	.194	16604	22.0	17	1N						
YUNN	22	0633	0637	06550	S16	W02	.190	16604	22.1	22D	1N		C		385	3.9	
PURP	22	0635	0637	0644	S17	W04	.215	16604	22.0	9	1N		C				
383 YUNN	22	0819	0825	0837	S16	W04	.193	16604	22.0	18	-F		C		64	.7	ZX
384 YUNN	22	0843	0845	0900	S16	W04	.199	16604	22.1	17	-N		C		48	.5	ZX
GRP81385	22	0902	0909	0934	S16	00	.187	16604	22.4	32	-N						
			0920														
YUNN	22	0902	0909	0932	S16	E00	.187	16604	22.4	30	-N		C		48	.5	
CATA	22	0905E	0920	0935	S16	W01	.188	16604	22.3	30D	-N	2	P	0920	112	1.1	
	22	1354	1452	NO FLARE PATROL													
	22	1518	1531	NO FLARE PATROL													
GRP81386	22	1531E		1553	S16	00	.187	16604	22.6	22	-F						E
HUAN	22	1531E		1547	S16	E03	.194	16604	22.9	16D	-F	1	P				E
BIGB	22	1542E	1542U	1558	S16	W03	.134	16604	22.4	16D	-N		P	1542	100	1.0	
387 BIGB	22	1800	1803	1811	S13	W38	.615	16601	19.9	11	-B		C	1803	90	1.2	ZX
388 BIGB	22	1858	1905	1932	S16	W05	.205	16604	22.4	34	-B		C	1905	70	.7	ZX
389 HOLL	22	1340	1356	2002	S16	W10	.252	16604	22.1	22	-F	3	C		44		ZX
390 YUNN	23	0100	0103	0113	S05	E41	.654	16609	26.1	13	-N		C		16	.2	ZX
GRP81391	23	0103+4	0108+5	0130	S17	W13	.237	16604	22.1	27	-N						D
YUNN	23	0103	0108	0132	S17	W13	.237	16604	22.1	29	-N		C		16	.2	
PURP	23	0107	0113	0126	S18	W13	.308	16604	22.1	21	-N		C				D
392 YUNN	23	0151	0152	0204	S17	W44	.702	16601	19.8	13	-B		C		48	.7	ZX
393 YUNN	23	0222	0227	0230	S17	W14	.303	16604	22.0	8	-F		C		48	.5	ZX
394 YUNN	23	0244	0248	0300	N10	W30	.553	16602	20.9	16	-F		C		32	.4	ZX
395 YUNN	23	0318	0332	0403	S17	W14	.303	16604	22.1	45	?N		C		225	2.4	ZX
	IMP.1 NO : PURP																
GRP81396	23	0417>9	0445+2	0503	S14	W13	.267	16604	22.2	46	-N						
YUNN	23	0417	0445	0513	S14	W13	.267	16604	22.2	56	-N		C		127	1.3	
PURP	23	0446	0447	0453	S14	W13	.267	16604	22.2	7	1F		P				
397 YUNN	23	0421E	0421	04250	N12	W30	.566	16602	20.9	40	-N		P		64	.8	ZX

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OBSERVATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		COND.	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.		
GRP81338	23	0540+6	0545+2	05521	S17	W14	.309	16604	22.2	12	-N							
CULG	23	0540E	0545U	0548U	S16	W15	.312	16604	22.1	68D	1N		P	0545	340	3.4		
YUNN	23	0546	0547	0552	S18	W14	.320	16604	22.2	6	-N		C		32	.3		
399 CULG	23	0551	0601	0607	S26	E58	.857	16615	27.6	16	-F		C	0601	6J	1.2		ZX
GRP81400	23	0611+5	0616+4	0632	S16	W15	.312	16604	22.1	21	-F						DJ	
ABST	23	0611	0616	0635	S15	W16	.317	16604	22.1	24	-N	*	C	0616	87	.9	DJ	
YUNN	23	0616	0620	0623	S17	W15	.322	16604	22.1	13	-F	*	C		32	.3		
GRP81401	23	0615+1	0620 0627	0630	S11	E60	.862	16618	27.8	15	-N						DJL	
ABST	23	0615	0620	0625	S12	E60	.862	16618	27.8	10	-N		C	0620	87	1.8	DJ	
CULG	23	0616	0627	0634	S11	E60	.862	16618	27.8	18	1N		C	0627	18J	3.6	L	
402 ABST	23	0647	0649	0700	S10	W04	.107	16606	23.0	13	-N		C	0649	87	.9	D	ZX
GRP81403	23	0708+7	0710+3	0735	S10	E60	.862	16618	27.8	27	-N				70	1.4	DJL	
ABST	23	0708	0710	0730	S10	E60	.862	16618	27.8	22	-N		C	0710	87	1.8	DJ	
CULG	23	0712	0719	0736	S11	E60	.862	16618	27.8	24	-N		C	0719	70	1.4	L	
CATA	23	0715	0715	0735	S10	E60	.862	16618	27.8	20	-N	2	C	0715	28	.5		
404 CULG	23	0716	0722	0723	S17	W47	.737	16601	19.8	13	-F		C	0722	90	1.4		ZX
GRP81405	23	0738+J	0741+5	0755	S17	W47	.737	16601	19.8	17	-N				110	1.7	D	
ABST	23	0738	0741	0750	S17	W47	.737	16601	19.8	12	-N		C	0741	87	1.3	D	
CULG	23	0738	0746	0800	S17	W48	.748	16601	19.7	22	-N		C	0746	130	2.0		
GRP81406	23	0741+9	0747+8	0805	S12	E61	.871	16618	27.9	24	1B				170	3.5	EKL	
ABST	23	0741	0747	0756	S17	E60	.864	16618	27.8	15	1N		C	0747	131	2.5	EK	
CULG	23	0744	0752	0813	S11	E60	.862	16618	27.8	29	2N		C	0752	400	8.0	L	
PURP	23	0748	0751	0753	S12	E62	.873	16618	28.0	5	1B		C					
ATHN	23	0750E	0752	0853U	S03	E62	.882	16618	28.0	63D	-B	3	S	0752	82	1.6		
CATA	23	0750	0755	0805	S12	E58	.845	16616	27.7	15	1B	2	C	0755	224	4.3		
GRP81407	23	0802+4	0804 0810+1	0815	N13	W32	.597	16602	20.3	13	1N						FJ	
ABST	23	0802	0804	0812	N12	W33	.603	16602	20.9	10	-N		C	0804	131	1.6	FJ	
CULG	23	0806	0811	0816U	N14	W32	.604	16602	20.9	10D	1F		P	0811	130	2.6		
YUNN	23	0810E	0810	0815	N13	W32	.597	16602	20.9	5D	1N		C		161	2.0		
GRP81408	23	0904	0917+1	0946	S14	W15	.295	16604	22.3	42	1N				310	3.3	EO	
YUNN	23	0904	0918	0941	S15	W16	.317	16604	22.2	37	1N		C		401	4.2		
KHAR	23	0911E	0917	0950	S13	W15	.287	16604	22.3	39D	1N		P	0917	220	2.4	EO	
GRP81409	23	0954	0958	1003	S17	W18	.361	16604	22.1	9	-N						D	
YUNN	23	0954	0958	1003	S17	W18	.361	16604	22.1	9	1N		C		225	2.4		
KHAR	23	0955E		1002D	S17	W19	.374	16604	22.0	7D	-F		P	0959	90	1.0	D	
410 KHAR	23	0955		1002D	N12	W34	.615	16602	20.9	7D	-F		P	0959	80	1.0	D	ZX
	23	1130	1150	NO FLARE PATROL														
411 KAMY	23	1252	1259	1308	S11	E57	.835	16618	27.8	16	-B	3	C		108			ZX
	23	1255	1430	NO FLARE PATROL														
412 KAMY	23	1422	1422	1432	S16	W15	.312	16604	22.5	10	-F	3	C		29			ZX
	23	1444	1452	NO FLARE PATROL														
413 HOLL	23	1459	1504	1512	S18	W16	.344	16604	22.4	13	-F	3	C		35		F	ZX
	23	1503	1600	NO FLARE PATROL														
414 HOLL	23	1523	1613U	1625	S17	W18	.361	16604	22.3	62	-N	3	C		181		F	ZX
415 HOLL	23	1607	1613	1616	S09	E61	.871	16618	28.2	9	-F	3	C		14			ZX
	23	1608	2010	NO FLARE PATROL														
416 HOLL	23	1639	1641	1655	S18	W13	.383	16604	22.3	16	-N	3	C		64		F	ZX
417 HOLL	23	1703	1711	1717	S18	W20	.396	16604	22.2	14	-N	3	C		73		F	ZX
418 HOLL	23	1722	1726	1736	S11	E56	.826	16618	27.9	14	-N	3	C		55			ZX

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS.		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONF.	TYPE	TIME UT	MEAS AREA Mln of Disk	CORR AREA Sq. Deg.		
GRP81419	23	1732+1	1734+4	1757	S15	W15	.333	16604	22.6	25	-B				80	.8	H	
BIGB	23	1732	1736	1806	S15	W15	.303	16604	22.6	34	-B		C	1736	70	.7		
HOLL	23	1733	1734	1757	S15	W16	.317	16604	22.5	24	-B	3	C		113		DE H	
KAMY	23	1737E	1738U	1750	S15	W15	.303	16604	22.6	130	-N	2	C		50			
420 HOLL	23	1812	1812	1820	S17	W19	.374	16604	22.3	8	-N	3	C		25			ZX
GRP81421	23	1929+1	1932+2	1955	N16	W38	.685	16602	21.0	26	-F				45	.6	F	
BIGB	23	1923	1934	1953	N20	W40	.728	16602	20.8	30	-N		C	1934	40	.5		
HOLL	23	1930	1932	1950	N13	W37	.657	16602	21.0	20	-F	3	C		52		F	
GRP81422	23	1930+2	1939+1	2003	S17	W19	.374	16604	22.4	33	1N				190	2.1		
HOLL	23	1930	1939	2003	S18	W20	.396	16604	22.3	33	-N	3	C		188			
BIGB	23	1931	1933	2022	S17	W19	.374	16604	22.4	51	1F		C	1933	240	2.6		
KAMY	23	1932	1940	1952	S16	W19	.366	16604	22.4	20	-N	2	C		93			
423 CULG	23	2015	2018	2023	S16	W19	.366	16604	22.4	8	-F		C	2018	100	1.1	T	ZX
424 CULG	23	2033	2041	2058	N10	W33	.531	16602	21.4	25	-F		C	2041	80	1.0		ZX
	23	2134	2200	NO FLARE PATROL														
GRP81425	23	2201+1	2203+3	2214	S16	W23	.422	16604	22.2	13	-N				35	.4		
BIGB	23	2201	2203	2215	S17	W20	.386	16604	22.4	14	-N		C	2203	40	.4		
HOLL	23	2202	2206	2213	S16	W27	.478	16604	21.9	11	-N	3	C		28			
GRP81426	23	2221+2	2226+0	2240	S16	W25	.450	16604	22.1	19	-N						FU	
CULG	23	2221	2226	2245	S17	W23	.423	16604	22.2	24	1F		C	2226	230	2.5	FUT	
HOLL	23	2223	2226	2235	S16	W28	.432	16604	21.8	12	-N	3	C		58			
GRP81427	23	2342+2	2345+2	2357	S17	W21	.401	16604	22.4	15	-N				140	1.5	KL	
CULG	23	2342	2345	0037	S16	W23	.422	16604	22.3	55	1N		C	2345	300	3.3	KLT	
BIGB	23	2343	2346	2354	S17	W20	.388	16604	22.5	11	-B		C	2346	120	1.3		
HOLL	23	2344	2347	2357	S18	W21	.409	16604	22.4	13	-N	3	C		137			
GRP81428	24	0057+2	0100+2	0119	S13	W26	.450	16604	22.1	22	1N				190	2.1	E	
YUNN	24	0057	0100	0119	S13	W25	.435	16604	22.2	22	-B		C		161	1.8		
VORO	24	0058	0102	0114	S12	W27	.461	16604	22.0	16	-N		C	0102	152	1.7	E	
CULG	24	0059	0102U	0133U	S13	W26	.450	16604	22.1	340	1N		P	0102	250	2.8		
429 VORO	24	0159	0202	0207	S17	E90	1.000	16622	30.8	8	?F		C	0202	54		DH	ZX
	IMP.1 NO : YUNN CULG																	
430 YUNN	24	0208E	0208	0219	N13	W45	.736	16602	20.7	110	-N		C		32	.5		ZX
GRP81431	24	0226+0	0231+5	0259	S17	W25	.455	16604	22.2	31	-F						EJ	
YUNN	24	0228	0231	0257	S17	W25	.455	16604	22.2	29	-N		C		80	.9		
VORO	24	0228	0236	0301	S18	W25	.462	16604	22.2	33	-F		C	0236	179	2.0	EJ	
432 YUNN	24	0445	0452	0458	S17	W25	.455	16604	22.3	13	-N		C		48	.5		ZX
433 YUNN	24	0445	0458	0500	N10	W43	.713	16602	21.0	15	-N	*	C		64	.9		ZX
GRP81434	24	0519	0528+1 0607	0635	S16	W25	.450	16604	22.3	76	-N							
CULG	24	0519	0529	0640U	S15	W25	.444	16604	22.3	810	1F		C	0525	260	2.9	FT	
YUNN	24	0525E	0528	0542	S17	W25	.455	16604	22.4	170	-N		C		48	.5	E	
YUNN	24	0558	0607	0630	S17	W25	.455	16604	22.4	32	-N		C		80	.9	E	
435 YUNN	24	0645	0648	0701	N11	W47	.761	16602	20.8	16	-F		C		32	.5		ZX
436 CULG	24	0646	0647	0657	S15	W26	.459	16604	22.3	11	-F		C	0647	20	.2	T	ZX
437 YUNN	24	0659	0705	0733	S17	W26	.469	16604	22.3	34	-F		C		48	.5		ZX
GRP81438	24	0745+5	0752+3	08001	N09	W49	.776	16602	20.6	15	-F				70	1.1	J	
YUNN	24	0745	0755	0835	N11	W46	.750	16602	20.9	50	-F		C		48	.7	E	
ABST	24	0750	0752	0800	N08	W53	.814	16602	20.4	10	-F		C	0752	87	1.4	DJ	
439 CULG	24	0753	0754	0800	S12	E46	.718	16618	27.8	7	-F		C	0754	130	1.8		ZX
GRP81440	24	0755+7	0804+7	0843	S16	W28	.492	16604	22.2	48	-N				110	1.3	FIJ	
CULG	24	0755	0809	0812U	S16	W28	.492	16604	22.2	170	1N		P	0809	330	3.8	TI	
YUNN	24	0802	0805	0858	S16	W27	.478	16604	22.3	48	-N		C		97	1.1		
ABST	24	0802	0804	0835	S16	W28	.432	16604	22.2	33	-N		C	0804	87	1.0	FJ	
ATHN	24	0808E	0811	0827U	S16	W33	.560	16604	21.9	190	-N	3	V	0811	131	1.6		

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS.		MEASUREMENTS			REMARKS
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX LON. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONF.	TYPE	TIME UT	MEAS. AREA Mill of Disk	CORR AREA Sq. Deg.	
GRP81441	24	0910	0938 0945	1014	S17	W29	.510	16604	22.2	64	-N						
YUNN	24	0910	0938	10000	S17	W27	.483	16604	22.4	500	-N		C		32	.4	
ATHN	24	0942E	0945	1014	S18	W32	.555	16604	22.0	320	-B	3	V	0945	98	1.2	
GRP81442	24	1106	1106 1126	1129	S16	W29	.505	16604	22.3	23	-N						E
LVOV	24	1106	1106	1124	S16	W30	.513	16604	22.2	18	-N		P	1106	150	1.8	BE
KANZ	24	1115E	1126	11340	S17	W28	.496	16604	22.4	190	-B	1					
443 RAMY	24	1149	1206	1223	N09	W49	.776	16602	20.8	34	-N	3	C		38		ZX
GRP81444	24	1201	1218 1225	1308	S17	W31	.537	16604	22.2	67	-B						
RAMY	24	1201	1225	1308	S17	W28	.496	16604	22.4	67	-B	3	C		51		FDE
ATHN	24	1213E	1218	12380	S18	W34	.581	16604	22.0	250	-B	3	S	1218	82	1.0	
445 RAMY	24	1235	1237	1306	N08	W48	.763	16602	20.9	31	-B	3	C		28		ZX
446 RAMY	24	1341	1344	1405	S15	W31	.529	16604	22.2	24	-N	3	C		103		ZX
447 RAMY	24	1418	1420	1456	S17	W30	.524	16604	22.3	38	-N	3	C		42		F ZX
GRP81448	24	1503	1547 1603	1746	S17	W31	.537	16604	22.3	163	-N						
RAMY	24	1503	1603	1651	S18	W31	.542	16604	22.3	108	-B	3	C		176		
BIGB	24	1542E	1547U	1746	S17	W31	.537	16604	22.3	1240	1N		P	1547	210	2.5	
HOLL	24	1721	1728	1753	S17	W34	.577	16604	22.2	32	-N	3	C		86		
449 RAMY	24	1557	1604	1619	S18	E76	.966	16622	30.4	22	-N	3	C				ZX
450 RAMY	24	1631	1631	1638	N12	W47	.764	16602	21.2	7	-F	3	C		32		ZX
GRP81451	24	1647+5	1653+3	1714	N14	W51	.811	16602	20.9	27	-N				50	.8	
RAMY	24	1647	1653	1739	N12	W47	.764	16602	21.2	22	-N	3	C		40		
BIGB	24	1652	1656	1719	N16	W56	.861	16602	20.5	27	-B		C	1656	70	1.3	
452 HOLL	24	1726	1728	1741	N11	W50	.792	16602	21.0	15	-F	3	C		47		ZX
GRP81453	24	1743+1	1745 1752	1801	N12	W55	.842	16602	20.6	18	-N						
RAMY	24	1743	1752	1803	N09	W55	.836	16602	20.6	20	-N	3	C		33		
BIGB	24	1744	1745	1758	N16	W56	.861	16602	20.5	14	-B		C	1745	100	1.8	
454 HOLL	24	1759	1803	1805	S19	W32	.555	16604	22.3	6	-F	3	C		22		ZX
GRP81455	24	1828	1842+1	1857	S17	W34	.577	16604	22.2	29	-N						F
RAMY	24	1828	1843	1902	S15	W34	.570	16604	22.2	34	-N	*	C		50		
PALE	24	1830E	1842	18440	S19	W34	.585	16604	22.2	140	1N	*	C		258		F
HOLL	24	1843	1843	1851	S17	W36	.603	16604	22.1	8	-F	*	C		24		F
GRP81456	24	1830+1	1833+0	1851	N08	W52	.805	16602	20.9	21	-N				70	1.2	F
PALE	24	1830E	1833	1858	N06	W54	.820	16602	20.7	280	-N	2	C		79		F
HOLL	24	1831	1833	1843	N11	W51	.802	16602	20.9	12	-N	3	C		57		
GRP81457	24	1900+2	1905 1926+0	1942	N07	W57	.850	16602	20.5	42	1N				150	2.8	F
PALE	24	1900	1926	1945	N06	W54	.820	16602	20.7	45	1N	2	C		149		F
RAMY	24	1902	1905	1909	N09	W55	.836	16602	20.7	7	-F	3	C		25		
RAMY	24	1924	1926	1938	N08	W64	.908	16602	20.0	14	1B	2	C		157		
458 PALE	24	1918	1931	1940	S16	E72	.947	16622	30.2	22	-F	2	C		73		ZX
459 RAMY	24	2028	2041	2053	N12	W50	.795	16602	21.1	25	-N	2	C		51		ZX
GRP81460	24	2039+8	2047+2 2055	2112	S18	W33	.568	16604	22.4	33	-N						F
CULG	24	2039	2047	21000	S15	W33	.557	16604	22.4	210	-N		C	2047	180	2.0	T
RAMY	24	2047	2049	2106	S18	W33	.568	16604	22.4	19	-N	2	C		32		
PALE	24	2054E	2055U	21170	S19	W34	.585	16604	22.3	230	-N	1	C		100		F
461 PALE	24	2054E	2055U	21170	N06	W55	.830	16602	20.7	230	-N	1	C		100		F ZX
462 PALE	24	2145E	2147U	2213	S06	E13	.224	16609	25.9	280	-F	2	C		102		DE ZX
463 CULG	24	2211	2218	2250	S13	E48	.742	16618	28.5	39	?F		C	2218	210	3.2	F ZX

IMP. 1 NO : BIGB PALE

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS.		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX WEB. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONG.	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.		
464 CULG	24	2226	2243	2303	S13	E16	.278	16609	26.1	37	-F		C	2243	60	.6		ZX
465 CULG	24	2238U	2254	2350U	S15	W35	.584	16604	22.3	800	?F		C	2254	170	2.1	TF	ZX
	IMP.1 NO : BIGB																	
466 CULG	24	2342	2349	2355	N11	W69	.882	16602	20.6	13	?N		C	2349	120	2.4		ZX
	IMP.1 NO : BIGB																	
467 VORO	25	0036	0037	0038	N11	W62	.838	16602	20.4	2	-N		C	0037	36		U	ZX
GRP81468	25	0045>9	0125+1	0149	S16	W35	.586	16604	22.4	64	-F				100	1.2	E	
YUNN	25	0045	0125	0158	S17	W36	.603	16604	22.3	73	-N		C		129	1.6		
VORO	25	0120	0126	0139	S16	W35	.586	16604	22.4	19	-F		C	0126	81	1.0	E	
469 YUNN	25	0143	0145	0155	S06	E12	.207	16609	26.0	12	-F		C		64	.7		ZX
GRP81470	25	0146	0149+1	0201	S13	W32	.536	16604	22.7	15	-F				140	1.7	EU	
VORO	25	0146	0149	0158	S14	W32	.533	16604	22.7	12	-F	*	C	0149	134	1.6	E	
CULG	25	0147E	0150	0203	S13	W32	.536	16604	22.7	160	-F	*	P	0150	150	1.8	U	
471 YUNN	25	0158	0206	0236	N11	W60	.882	16602	20.6	38	-F		C		32	.7		ZX
472 CULG	25	0216E	0218	0224	S11	W33	.546	16604	22.6	80	-F		P	0218	100	1.2	T	ZX
GRP81473	25	0253>9	0306	0459	S15	W35	.583	16604	22.5	126	-N				150	1.9		
			0446+1															
YUNN	25	0253	0306	0435	S16	W40	.651	16604	22.1	102	-N		C		64	.8		
CULG	25	0420	0447U	0502U	S15	W33	.556	16604	22.7	420	1N		C	0447	180	2.2	T	
YUNN	25	0443	0446	0455	S16	W35	.586	16604	22.6	12	-N		C		129	1.6		
GRP81474	25	0306+2	0312+3	0328	N11	W61	.890	16602	20.6	22	-N				80	1.7		
YUNN	25	0306	0315	0355	N11	W53	.874	16602	20.7	43	1B		C		167	3.3		
VORO	25	0308	0312	0328	N11	W63	.905	16602	20.4	20	-N		C	0312	81			
PALE	25	0312E	0312U	0321	N06	W61	.883	16602	20.6	90	-F	2	C		47		DE	
GRP81475	25	0337>9	0353	0434+1	N10	W55	.838	16602	21.0	57	-F							
CULG	25	0337	0353	0434	N10	W52	.810	16602	21.3	57	-F		C	0353	40	.7		
YUNN	25	0428	0444	0536	N11	W59	.874	16602	20.8	62	-N		C		64	1.3		
476 ABST	25	0622	0628	0640	S16	E69	.929	16622	30.4	18	-N		C	0628	87		DJ	ZX
GRP81477	25	0655+1	0655+5	0710	N10	W60	.881	16602	20.8	15	-N						DJ	
ABST	25	0655E	0655	0710	N11	W61	.890	16602	20.7	150	-N		P	0655	87	1.8	DJ	
YUNN	25	0656	0700	0709	N10	W60	.881	16602	20.8	13	-N		C		32	.7		
478 CULG	25	0702	0708	0721	N20	W85	.333		18.3	19	-F		C	0708	20			ZX
479 ABST	25	0728	0732	0750	S06	E09	.156	16609	26.0	22	-F		C	0732	131	1.4	EJ	ZX
480 ABST	25	0732	0736	0750	S16	W48	.651	16604	22.3	18	-F		C	0736	87	1.2	DJ	ZX
481 CULG	25	0811	0817	0830	N12	W57	.860	16602	21.1	19	?N		C	0817	120	2.4	T	ZX
	IMP.1 NO : YUNN ABST																	
482 CULG	25	0832	0833	0835	S13	W30	1.000	16601	18.6	3	-F		C	0833	20			ZX
483 YUNN	25	0838E	0839	0857U	S16	W42	.675	16604	22.2	190	-N		P		32	.4		ZX
	25	1015	1020	NO FLARE PATROL														
	25	1045	1120	NO FLARE PATROL														
	25	1125	1150	NO FLARE PATROL														
484 RAMY	25	1309	1311	1319	S16	W39	.638	16604	22.6	10	-N	3	C		26		F	ZX
485 RAMY	25	1333	1334	1346	N08	W68	.334	16602	20.5	13	-N	3	C		17			ZX
486 RAMY	25	1409	1413	1426	S16	E63	.888	16622	30.3	17	-N	3	C		82			ZX
487 RAMY	25	1432	1434	1435	N12	W59	.876	16602	21.2	3	-F	3	C		13			ZX
488 RAMY	25	1446	1447	1503	N08	W68	.334	16602	20.5	17	-B	3	C		48			ZX
489 RAMY	25	1451	1451	1455	S16	E64	.895	16622	30.4	4	-F	3	C		24			ZX
GRP81490	25	1506+7	1518+1	1525	S13	W44	.706	16604	22.3	13	-N				25	.4		
RAMY	25	1506	1518	1524	S13	W44	.706	16604	22.3	18	-B	3	C		32			
HOLL	25	1513	1519	1525	S19	W44	.736	16604	22.3	12	-N	3	C		23			

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONF.	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.		
GRP81491	25	1532+0	1533+1	1541	S20	E68	.924	16622	30.7	9	-F				30		F	
HOLL	25	1532	1534	1543	S20	E68	.924	16622	30.7	11	-F	3	C		34		F	
KAMY	25	1532	1533	1538	S20	E69	.930	16622	30.8	6	-F	3	C		33			
GRP81492	25	1600+1	1603+5	1630	S18	W44	.704	16604	22.4	30	-N				80	1.1		
BIGB	25	1600	1608	1630	S19	W41	.671	16604	22.6	30	-B		C	1608	70	1.0		
HOLL	25	1600	1603	1630	S18	W44	.704	16604	22.4	30	-N	3	C		109		F	
HUAN	25	1600E		16030	S17	W44	.702	16604	22.4	30	-F	1	P					
KAMY	25	1601	1603	1716	S18	W45	.715	16604	22.3	75	-B	3	C		73		FDE	
GRP81493	25	1612+4	1616+1	1625	N08	W65	.915	16602	20.8	13	-N				30			
HOLL	25	1612	1617	1619	N08	W65	.915	16602	20.8	7	-F	3	C		15			
BIGB	25	1615	1616	1625	N13	W70	.951	16602	20.4	10	-B		C	1616	40			
KAMY	25	1616	1616	1625	N08	W65	.915	16602	20.8	9	-N	3	C		19			
GRP81494	25	1637	1720+1	1739	S18	W46	.727	16604	22.2	62	-B				100	1.5	F	
HOLL	25	1637	1721	1743	S18	W47	.738	16604	22.2	66	-B	*	C		116		F	
KAMY	25	1719E	1720	1735	S18	W46	.727	16604	22.3	160	-B	*	C		75			
495 HOLL	25	1641	1641	1640	N07	W66	.921	16602	20.7	5	-F	3	C		49			ZX
496 HOLL	25	1710	1718	1741	N07	W68	.934	16602	20.6	31	-N	3	C		26			ZX
GRP81497	25	1749>9	1846 2022+0	2112	N08	W67	.928	16602	20.7	203	1N				120		F	
HOLL	25	1749	2022	2308	N08	W68	.934	16602	20.6	319	1B	3	C		132			
KAMY	25	1842	1848	1934	N08	W67	.928	16602	20.8	52	-F	3	C		21			
PALE	25	2009E	2022	2030	N06	W68	.933	16602	20.7	250	1N	2	C		113		F	
CULG	25	2126U	2134	2150	N10	W70	.948	16602	20.6	240	1N		C	2134	140		T	
GRP81498	25	1903>9	2108 2133>9	2347	S19	W50	.772	16604	22.0	284	2B				450	7.2	FUZ	
PALE	25	1903E	1904U	1952	S20	W47	.742	16604	22.3	490	-F	2	C		57		FDE	
HOLL	25	1917	2108	2335	S19	W51	.782	16604	22.0	258	1B	3	C		400		U F	
CULG	25	2056	2133	23100	S17	W50	.763	16604	22.1	1340	3B		C	2133	800	12.0	TUFZ	
BIGB	25	2058	2145	2359	S19	W49	.659	16604	22.9	181	2B		C	2145	450	6.1		
PALE	25	2306E	2313U	23140	S20	W36	.614	16604	23.3	80	-F	2	C		68		FDE	
499 CULG	25	2055U	2148	2206U	N13	E74	.374		31.4	710	?F		C	2148	200		G	ZX
	IMP.2 NO : HOLL BIGB																	
500 CULG	25	2113	2123	2211	N18	W80	.991	16611	13.3	58	*-N		C	2123	30			ZX
501 PALE	25	2313E	2313U	23140	S06	E12	.207		26.9	10	-F	2	C		36		FDE	ZX
502 YUNN	26	0240	0252	0336	S16	W52	.788	16604	22.2	56	-N		C		64	1.0		ZX
503 YUNN	26	0314	0317	0340	N09	W70	.947	16602	20.9	26	-N		C		64		K	ZX
504 YUNN	26	0457	0524	0539	N09	W70	.947	16602	21.0	42	-F		C		16			ZX
GRP81505	26	0616	0621	0650	S14	W54	.807	16604	22.2	34	-F				60	1.0		
CULG	26	0616	0621	06340	S14	W55	.817	16604	22.1	180	-F		C	0621	80	1.4		
YUNN	26	0622E	0622	0650	S15	W53	.797	16604	22.3	280	-N		C		48	.8		
506 AbST	26	0624	0630	0658	N09	W75	.971	16602	20.6	34	?F		C	0630	87		DJ	ZX
	IMP.1 NO : MITK YUNN CULG																	
GRP81507	26	0656+4	0702+2	0716	S16	W54	.808	16604	22.2	20	1N				140	2.4	EJU	
AbST	26	0656	0703	0725	S16	W56	.827	16604	22.1	29	1N		C	0703	174	3.2	EJ	
MITK	26	0658	0702	0715	S16	W55	.818	16604	22.2	17	1N		C	0702	120	2.2	E	
TACH	26	0659	0704	0707	S14	W46	.720	16604	22.8	8	1B		C	0704	115	2.1	U	
YUNN	26	0700	0704	0717	S17	W54	.809	16604	22.2	17	2B		C		321	5.5		
508 YUNN	26	0720	0725	0747	N08	W70	.946	16602	21.1	27	-N		C		16			ZX
509 YUNN	26	0729	0732	0807	S16	W55	.818	16604	22.2	38	-N		C		80	1.4		ZX
510 AbST	26	0734	0739	0750	N04	E89	1.000	16625	2.0	16	?N		C	0739	87		AD	ZX
	IMP.1 NO : YUNN TACH CAIA																	
511 YUNN	26	0850	0854	0930	N09	W70	.947	16602	21.1	40	-N		C		16		E	ZX
512 YUNN	26	0947	0957	1000D	S16	W54	.808	16604	22.4	130	-N		C		48	.8		ZX
	26	1000	1010	NO FLARE PATROL														
	26	1040	1050	NO FLARE PATROL														

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS.		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		COND.	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.		
	26	1055	1057	NO FLARE PATROL														
513 RAMY	26	1208	1218	1321	N07	W79	.384	16602	20.6	73	-N	3	C				F	ZX
514 RAMY	26	1250	1251	1302	NJ4	E81	.989	16625	1.6	12	-F	3	C					ZX
515 RAMY	26	1443	1444	1447	N09	W79	.985	16602	20.7	4	-N	3	C					ZX
516 RAMY	26	1510	1516	1518	N07	W75	.970	16602	21.0	8	-N	3	C		18			ZX
517 HOLL	26	1534	1534	1558	N08	W82	.992	16602	20.5	24	-F	3	C					ZX
518 HOLL	26	1656	1658	1703	N06	W80	.987	16602	20.7	7	-N	3	C		14			ZX
519 HOLL	26	1719	1720	1728	NJ6	W89	1.000	16602	20.J	9	-N	3	C					ZX
520 HOLL	26	1832	1832	1841	N06	W89	1.000	16602	20.1	9	-N	3	C					ZX
GRP81521	26	1918>3	1928 1938+0	1946	N07	W81	.930	16602	20.7	28	-N							
PALE	26	1918E	1928	1959	N07	W84	.936	16602	20.5	410	-F	*	C				DE	
RAMY	26	1937	1938	1942	N08	W80	.987	16602	20.8	5	-N	*	C					
HOLL	26	1938	1938	1946	NJ6	W81	.989	16602	20.7	8	-N	*	C		20			
GRP81522	26	1930>9	1953+2	2001	N04	E73	.959	16625	3.3	31	-F						F	
PALE	26	1930	1955	1953	N04	E73	.953	16625	1.3	29	-F	3	C		42		F	
RAMY	26	1952	1953	2002	NJ4	E74	.964	16625	1.4	10	-F	3	C					
523 PALE	26	2000	2002	2004	N06	W85	.997	16602	20.5	4	-F	3	C				DE	ZX
GRP81524	26	2113>3	2128+0	2146	N07	W86	.998	16602	20.4	33	-N							
PALE	26	2113E	2128U	2145	N06	W87	.999	16602	20.4	320	-N	3	C				DE	
HOLL	26	2125	2128	2146	N08	W85	.997	16602	20.5	21	-N	3	C					
GRP81525	26	2201>9	2211+1	2221	N07	W86	.998	16602	20.5	20	-N							
HOLL	26	2201	2211	2223	N08	W89	1.000	16602	20.2	22	-N	*	C					
PALE	26	2211	2212	2218	N07	W83	.994	16602	20.7	7	-N	*	C		31			
GRP81526	26	2203+0	2204 2211	2221	S18	W62	.880	16604	22.3	18	-N							
PALE	26	2203	2211	2219	S18	W63	.888	16604	22.2	16	-N	3	C		13		DE	
HOLL	26	2203	2204	2223	S13	W61	.873	16604	22.3	20	-N	3	C		36		F	
527 PALE	26	2315E	2347	JJJ8	NJ2	E74	.963	16625	1.5	530	-F	3	C					ZX
528 BIGB	27	0000	0005	0016	N17	W79	.988	16602	21.1	16	7N		C	0005	90			ZX
	IMP.1 NO I PALE																	
GRP81529	27	0058+1	0114	0124	S17	W64	.895	16604	22.2	31	-N						K	
YUNN	27	0058	0114	0125	S16	W62	.879	16604	22.4	27	-B		C		32	.7	K	
PALE	27	0059		0132	S19	W66	.910	16604	22.1	33	-N	3	C		37		DE	
GRP81530	27	0236	0238	0245	S19	E43	.694	16622	30.3	9	-B						D	
VORO	27	0236	0238	0246	S20	E44	.708	16622	30.4	10	-B		C	0238	116	1.7	D	
YUNN	27	0240E	0240	0244	S19	E43	.694	16622	30.3	40	-N		C		48	.7		
GRP81531	27	0316+2	0320+1	0329	N01	E70	.941	16625	3.4	13	-N						D	
YUNN	27	0316	0321	0330	N01	E69	.935	16625	1.3	14	-N		C		16			
VORO	27	0318	0320	0328	N02	E71	.947	16625	1.5	10	1F		C	0320	90		D	
532 YUNN	27	0342	0350	0410	N09	W76	.975	16602	21.5	28	-N		C		16		K	ZX
533 YUNN	27	0343E	0343	0348	N29	W15	.609	16623	26.0	50	-N		C		16	.2		ZX
534 YUNN	27	0518	0524	0545	S17	W62	.880	16604	22.6	27	-N		C		64	1.3		ZX
535 YUNN	27	0530	0533	0551	N01	E68	.923	16625	1.3	21	-N		C		32			ZX
536 YUNN	27	0620	0633	0708	NJ1	E69	.935	16625	1.4	48	-N		C		48			ZX
537 YUNN	27	0655	0655	0735	N15	E25	.533	16621	23.2	40	-N		C		32	.4	GK	ZX
	27	1110	1135	NO FLARE PATROL														
538 CATA	27	1140	1145	1200	N15	E90	1.000	16627	3.2	20	1F	2	C	1145	84			ZX
539 CATA	27	1150	1200	1225	N10	W30	1.000	16602	20.7	35	1B	2	C	1200	84		A	ZX

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS.		MEASUREMENTS			REMARKS
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		COND	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.	
540 KAMY	27	1236	1251	1311	NJ2	E70	.942	16625	1.8	35	-F	3	C		17		ZX
541 KAMY	27	1255	1259	1318	S11	E09	.180	16618	28.2	23	-N	3	C		32		ZX
542 KAMY	27	1314	1323	1330	N03	E64	.903	16625	1.4	16	-F	3	C		21		ZX
	27	1358	1445	NO FLARE PATROL													
	27	1449	1501	NO FLARE PATROL													
GRP81543	27	1815+1	1817+2	1849	N03	E61	.879	16625	3.3	34	1B				150	3.1	
BIGB	27	1815	1817	1900	N11	E63	.905	16625	1.5	45	1N		C	1817	210	4.8	
KAMY	27	1816	1817	1848	N03	E61	.879	16625	1.3	32	-B	3	C		118		
HOLL	27	1817E	1813	1849	NJ3	E61	.879	16625	1.3	320	-B	3	C		119		
544 BIGB	27	1859	1902	1915	N12	E90	1.000	16627	3.5	16	-B		C	1902	50		ZX
GRP81545	27	2129	2135+1	2138?	S10	E04	.103	16618	28.2	9	-F						F
HOLL	27	2129	2135	2138D	S11	E04	.116	16618	28.2	90	-F	3	C		57		F
CULG	27	2131E	2136	2137D	S10	E04	.133	16618	28.2	60	-N		P	2136	180	1.8	
546 CULG	27	2131E	2134	2137D	N15	E79	.987	16627	2.8	60	-N		P	2134	40		ZX
	27	2141	2151	NO FLARE PATROL													
547 CULG	27	2210	2223	2256	S15	W76	.966	16604	22.2	46	-N		C	2223	70		ZX
548 CULG	27	2233	2233	2304	N12	E88	1.000	16627	3.5	31	-N		C	2233	40		K ZX
GRP81549	27	2315>9	2337 2347	0008?	N02	E65	.909	16625	3.8	53	1N						F
PALE	27	2315E	2347	0008	N02	E74	.963	16625	2.5	530	-F	3	C				
CULG	27	2330	2337	0040	N02	E61	.878	16625	1.6	70	2N		C	2337	300	6.0	
MANI	27	2340E	2340U	2348D	NJ8	E65	.915	16625	1.9	80	-N	2	V		80	1.7	F
550 CULG	28	0011	0014	0017	N15	E83	.996	16627	3.2	6	-F		C	0014	20		T ZX
GRP81551	28	0025>3	0037+1	0050	S22	E36	.621	16622	30.7	25	-N				90	1.2	E
CULG	28	0025U	0038	0053U	S22	E37	.633	16622	30.8	280	-N		C	0038	140	1.8	
VORO	28	0034	0037	0050	S22	E36	.621	16622	30.7	16	-N		C	0037	90	1.2	E
YUNN	28	0036	0037	0045	S22	E35	.609	16622	30.7	9	-N		C		32	.4	E
552 CULG	28	0052	0056	0106	N13	E89	1.000	16627	3.7	14	-F		C	0056	30		T ZX
553 CULG	28	0114	0120	0128	N16	E87	1.000	16627	3.6	14	F		C	0120	80		T ZX
	IMP.1 NO : VORO YUNN MITK																
GRP81554	28	0153+1	0156+4	0207	N01	E56	.832	16625	3.3	14	-N						EJ
YUNN	28	0153	0156	0205	N01	E55	.822	16625	1.2	12	-N		C		32	.6	
VORO	28	0154	0200	0208	N02	E57	.843	16625	1.4	14	1F		C	0200	161	3.1	EJ
GRP81555	28	0226	0228+2	0250	N04	E57	.846	16625	3.4	24	?F						EJ
VORO	28	0226	0230	0255	N06	E59	.866	16625	1.5	29	?F		C	0230	260	5.3	EJ
	IMP.2 IMP.S																
YUNN	28	0228E	0228	0244	N03	E56	.835	16625	1.3	160	-N		C		80	1.5	
GRP81556	28	0230+1	0305+4	0353?	S16	W79	.978	16604	22.2	83	1N				100		FK
CULG	28	0230	0309	0456	S15	W80	.981	16604	22.1	146	2B		C	0309	320		KF
YUNN	28	0231	0305	0353	S16	W73	.952	16604	22.6	82	1N		C		129		
VORO	28	0247		0304D	S17	W81	.984	16604	22.0	170	1F		P	0303	81		E
MANI	28	0310E	0310U	0321D	S18	W78	.974	16604	22.3	110	-N	2	V		80	2.0	F
557 MANI	28	0310E	0310U	0321D	N19	E05	.426	16617	28.5	110	-F	2	V		40	.4	ZX
558 CULG	28	0335	0341	0352	N16	E86	.999	16627	3.6	17	-F		C	0341	40		T ZX
559 CULG	28	0352	0357	0410	S08	W83	.991	16613	21.9	18	-F		C	0357	30		ZX
560 MANI	28	0435E	0435U	0458D	N12	E80	.983	16627	3.2	230	-F	3	V		50	1.3	ZX
561 CULG	28	0522	0522	0537	S16	W80	.981	16604	22.2	15	?N		C	0522	80		T ZX
	IMP.1 NO : YUNN																
562 MANI	28	0629E	0631U	0637D	S20	E30	.537	16622	30.5	80	-N	4	V		40	.5	ZX
GRP81563	28	0632	0643	0705	N14	E70	.952	16627	4.5	33	-F				50		K
CULG	28	0632	0643	0715	N15	E71	.958	16627	2.6	43	-F		C	0643	60		TK
MANI	28	0645E	0645U	0655	N14	E69	.947	16627	2.5	100	-F	4	V		40	.5	

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS		MEASUREMENTS			REMARKS
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONO	TYPE	TIME UT	MEAS. AREA Millionths of Disk	CORR AREA Sq. Deg.	
GRP81564	28	0735	0739+1	0758	N03	E54	.815	16625	3.4	23	1N						F
KANZ	28	0735	0739	0758	N03	E53	.805	16625	1.3	23	1B	1					
MANI	28	0738E	0740U	0748D	N04	E56	.836	16625	1.5	100	1N	4	V		150	2.6	F
565 CULG	28	0744	0747	0802	S08	W90	1.000	16613	21.6	18	-F		C	0747	30		ZX
GRP81566	28	0844+1	0848	0900	S15	W80	.981	16604	22.4	16	-N				40		E
WEND	28	0844E		0904	S15	W83	.990	16604	22.1	200	-N		C	0853	25		E
YUNN	28	0845	0848	0856	S16	W78	.974	16604	22.5	11	-N		C		48		
GRP81567	28	0909+3	0912+3	0929	N02	E53	.804	16625	3.4	20	-F				50	.8	E
MONT	28	0903	0914	0921	N03	E55	.825	16625	1.5	12	-F		C	0914	50		E
YUNN	28	0910	0915	0930	N03	E53	.805	16625	1.4	20	1N		C		161	2.7	
WEND	28	0911	0915	0932	N02	E53	.804	16625	1.4	21	-N		C	0915	44	.8	E
KANZ	28	0912	0912	0927	N02	E54	.814	16625	1.4	15	-F	2					
568 YUNN	28	0925	0925	0926	S22	E30	.548	16622	30.6	1	-N		C		48	.6	ZX
GRP81569	28	1048+3	1051+1	1105	N05	E59	.865	16625	3.9	17	-N						E
WEND	28	1048	1052	1115	N05	E59	.865	16625	1.9	27	-N		C	1052	46	1.0	
KANZ	28	1051	1051	1055	N05	E60	.873	16625	2.0	4	-N	2					E
GRP81570	28	1151+6	1156+1	1214	N04	E53	.807	16625	3.5	23	-N				43	.7	D
WEND	28	1151		1206D	N05	E52	.799	16625	1.4	150	-N		C	1154	38	.6	
KANZ	28	1152	1156	1216	N04	E54	.817	16625	1.5	24	-N	2					
MONT	28	1153	1156	1206	N03	E54	.815	16625	1.5	13	-F		C	1156	50		D
RAMY	28	1157	1157	1214	N07	E53	.813	16625	1.5	17	-N	3	C		27		
GRP81571	28	1302+1	1305+2	1314	N06	E60	.875	16625	4.0	12	-F						D
MONT	28	1302	1305	1312	N06	E61	.883	16625	2.1	10	-F		C	1305	70		D
KANZ	28	1303	1307	1315	N06	E59	.866	16625	2.0	12	-F	2					
572 ATHN	28	1304E	1306	1331D	S17	W83	.989	16604	22.3	270	-N	3	V	1306	49	2.5	ZX
GRP81573	28	1334+1	1335+1	1354	S17	W86	.995	16604	22.1	20	-B						D
RAMY	28	1334	1336	1352	S13	W86	.995	16604	22.1	18	-N	3	C				
MONT	28	1334E	1336	1340D	S16	W87	.997	16604	22.0	60	-B		C	1336	20		D
KANZ	28	1335	1335	1355	S17	W86	.995	16604	22.1	20	-B	1					
	28	1410	2009	NO FLARE PATROL													
574 RAMY	28	1416	1417	1425	N04	E53	.807	16625	1.6	9	-N	3	C		21		ZX
575 RAMY	28	1441	1442	1450	N05	E53	.809	16625	1.6	9	-N	3	C		34		ZX
576 RAMY	28	1539	1543	1554	N13	E80	.983	16627	3.7	15	-F	3	C				ZX
577 RAMY	28	1852	1906	1936	N04	E49	.765	16625	1.5	44	-N	3	C		68		ZX
	28	2013	2145	NO FLARE PATROL													
578 CULG	28	2145E	2145E	2210	N14	E75	.974	16627	3.5	250	1N		P	2145	180		ZX
	28	2153	2154	NO FLARE PATROL													
579 HOLL	28	2228	2231	2242D	S21	E20	.418	16622	30.4	140	1N	2	C		224		F ZX
	28	2242	2314	NO FLARE PATROL													
	28	2329	2332	NO FLARE PATROL													
	29	0136	0149	NO FLARE PATROL													
	29	0200	0207	NO FLARE PATROL													
GRP81580	29	0215+8	0217+6	0231	N16	E66	.932	16627	5.3	16	-F				35		
MANI	29	0215E	0217U	0226	N18	E67	.941	16627	3.1	110	-F	3	V		40	.8	
YUNN	29	0223	0223	0235	N15	E65	.925	16627	3.0	12	-N		C		32		
581 YUNN	29	0244	0244	0244D	N13	E59	.879	16627	2.5		-N		C		48	1.0	ZX
GRP81582	29	0258	0305 0316	0330	N02	E44	.702	16625	3.4	32	2N						
YUNN	29	0258	0305	0312	N03	E45	.717	16625	1.5	14	2N		C		385	5.5	
YUNN	29	0302	0316	0330	N02	E44	.702	16625	1.4	28	-N		C		129	1.9	
GRP81583	29	0352+1	0355+2	0404	N02	E44	.702	16625	3.5	12	?N						F
MANI	29	0352E	0355	0402	N03	E45	.717	16625	1.5	100	?N	3	V		80	1.2	F
	IMP.S IMP.2																
YUNN	29	0353	0357	0406	N02	E44	.702	16625	1.5	13	2N		C		707	10.2	

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS.		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		CONF.	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.		
GRP81584	29	0644	0650+2	0709	S20	E15	.348	16622	30.4	25	-N						F	
YUNN	29	0644	0650	0709	S21	E15	.353	16622	30.4	25	-N		C		123	1.4		
MANI	29	0650E	0652U	0705D	S20	E15	.348	16622	30.4	150	-N	3	V		50	.6	F	
GRP81585	29	0656	0705+4	0717?	N14	E64	.917	16627	5.1	21	1N				90	2.2	FH	
YUNN	29	0656	0709	0921	N13	E63	.909	16627	3.0	145	1N		C		129	2.9		
MANI	29	0702E	0705U	0717	N15	E66	.331	16627	3.2	150	-N	3	V		60	1.3	FH	
586 YUNN	29	0721	0737	0817	N03	E43	.693	16625	1.5	56	1N		C		193	2.7		ZX
587 MANI	29	0810E	0812	0825D	S13	E85	.994	16631	4.7	15D	-N	3	V		20	5.4		ZX
588 ABST	29	0857E	0900	0906D	S21	E15	.353	16622	30.5	30	-F		P	0900	131	1.4	EJ	ZX
589 ABST	29	0902	0904	0906D	N05	E41	.673	16625	1.5	40	-F		P	0904	131	1.6	EJ	ZX
590 KANZ	29	0909	0909	0924	S17	E30	1.000	16631	5.1	15	-B	2						ZX
591 KHAR	29	0938E	0938	0941D	N05	E45	.722	16625	1.8	3D	-F		P				E	ZX
GRP81592	29	0943+1	0945+4	1011	N02	E42	.678	16625	3.6	28	1B				170	2.3	EO	
KANZ	29	0943	0947	1007	N02	E41	.665	16625	1.5	24	-B	2					E	
YUNN	29	0943	0949	1015D	N02	E42	.678	16625	1.6	320	1N		C		241	3.4		
KHAR	29	0944	0948	1024D	N03	E45	.717	16625	1.8	400	1N		P	0951	160	2.3	EO	
CATA	29	0945E	0945	0950D	N03	E39	.642	16625	1.3	50	-B	1	P	0945	112	1.5		
CATA	29	0945E	0945	0950D	N04	E45	.719	16625	1.8	50	-N	1	P	0945	28	.4		
ATHN	29	0946E	0948	1005	N01	E43	.688	16625	1.6	130	-B	3	V	0948	164	2.2		
593 KHAR	29	1012E	1015	1018D	S14	E90	1.000	16631	5.2	60	-F		V					ZX
594 KANZ	29	1041	1045	1052	S17	E90	1.000	16631	5.2	11	-B	2						ZX
GRP81595	29	1123+1	1131	1150	S21	E13	.338	16622	30.5	21	-N						E	
			1138															
KHAR	29	1129E	1131	1149D	S23	E14	.373	16622	30.5	200	-N		P	1131	75	.8	E	
KANZ	29	1130	1138	1150	S20	E13	.326	16622	30.5	20	-B	2						
GRP81596	29	1208+1	1213	1310	N06	E40	.664	16625	3.5	62	-N				110	1.5		
			1221+3															
RAMY	29	1208	1221	1310	N07	E40	.668	16625	1.5	62	-N	3	C		129			
KANZ	29	1209	1224	1240D	N06	E40	.664	16625	1.5	310	-N	2						
KHAR	29	1210E	1213	1243D	N06	E41	.677	16625	1.6	330	-N		P	1220	90	1.3		
597 RAMY	29	1241	1242	1250	S21	E14	.348	16622	30.6	9	-N	3	C		29			ZX
598 RAMY	29	1324	1325	1332	N15	E55	.851	16627	2.7	8	-N	3	C		40		F	ZX
599 RAMY	29	1401	1402	1407	S15	E88	.998	16631	5.2	6	-N	3	C					ZX
600 RAMY	29	1428	1430	1440	N15	E57	.868	16627	2.9	12	-F	3	C		54			ZX
601 RAMY	29	1507	1508	1521	S19	E11	.233	16622	30.5	14	-F	3	C		24			ZX
602 RAMY	29	1540	1601	1617	N13	E60	.887	16627	3.2	37	-F	3	C		43			ZX
603 RAMY	29	1544	1603	1631	S20	E10	.296	16622	30.4	47	-N	3	C		99			ZX
604 RAMY	29	1644	1654	1700	S15	E79	.978	16631	4.6	16	-N	3	C		17			ZX
605 RAMY	29	1853	1855	1900	N13	E57	.863	16627	3.1	7	-F	3	C		15			ZX
606 RAMY	29	1935	1937	1944	N14	E57	.865	16627	3.1	9	-F	2	C		30			ZX
607 RAMY	29	2114	2114	2121	N15	E53	.834	16627	2.9	7	-F	2	C		17			ZX
	29	2132	2325	NO FLARE PATROL														
	30	0053	0112	NO FLARE PATROL														
	30	0125	0131	NO FLARE PATROL														
608 MANI	30	0625E	0627	0640	N02	E31	.529	16625	1.6	15D	-N	4	V		60	.7		ZX
609 KHAR	30	0859E		0915D	N25	E75	.382	16637	5.0	16D	-F		P				DH	ZX
GRP81613	30	0918E		0925?	N17	E73	.969	16634	6.9	7	-F						H	
KHAR	30	0918E		0925D	N21	E72	.968	16634	4.8	7D	-F		P				DH	
KHAR	30	0918E		0922D	N14	E75	.374	16634	5.0	4D	-F		P				DH	

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OBSERV-ATORY	OBSERVED UT				LOCATION					DURA-TION	IMPOR-TANCE	OBS.		MEASUREMENTS			REMARKS	
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		COND.	TYPE	TIME UT	MEAS. AREA Millionths of Disk	CORR. AREA Sq. Deg.		
611 KHAR	30	0952E	0953	1000	N32	E33	.557	16625	1.9	80	-F		P				D	ZX
612 KHAR	30	0953E	0953	0957	N21	E72	.968	16634	4.8	40	-F		P				DH	ZX
GRP81613	30	1537+3	1541	1650	S20	W02	.246	16622	30.5	73	-N							
RAMY	30	1537	1541	1654	S20	W02	.246	16622	30.5	73	1N	3	C		276		F	
HUAN	30	1540		1613	S21	W03	.266	16622	30.4	330	-F	1	P				E	
GRP81614	30	1642+3	1644+2	1701	N15	E41	.715	16627	4.8	19	-N				110	1.5	M	
PASA	30	1642	1644	1718	N15	E41	.715	16627	2.8	36	-N	1			150	2.8	M	
RAMY	30	1645	1646	1701	N15	E41	.715	16627	2.8	16	-N	3	C		84		F	
HLAN	30	1645		1654	N15	E45	.757	16627	3.1	9	-F	1	C				E	
615 RAMY	30	1717	1753	1802	S12	E66	.909	16631	4.7	45	-N	3	C		21			ZX
616 RAMY	30	1727	1727	1753	N10	E53	.820	16627	3.7	26	-F	3	C		16			ZX
GRP81617	30	1733+2	1737 1743	1842	N05	E25	.457	16625	3.6	69	-B						F	
PASA	30	1733	1737	1850	N05	E27	.486	16625	1.8	77	-B	1			100	1.1		
HLAN	30	1734		10260	N05	E25	.457	16625	1.6	520	-N	1	P	1746	30	.4		
RAMY	30	1735	1749	1833	N06	E24	.450	16625	1.5	58	-B	3	C		168		F	
618 RAMY	30	1931	1933	1947	N14	E43	.732	16627	3.0	16	-F	3	C		16			ZX
619 RAMY	30	1956	1958	2009	S19	W04	.237	16622	30.5	13	-N	3	C		140		F	ZX
620 PASA	30	1957	1958	20050	N08	W02	.242		30.7	80	-F	1			75	.8	G	ZX
621 RAMY	30	2050	2112	21440	S12	E64	.894	16631	4.7	540	-F	3	C		34		F	ZX
	30	2144	2345	NO FLARE PATROL														
	30	2353	0003	NO FLARE PATROL														
622 MANI	31	0053E	00560	0112	S11	E62	.878	16631	4.7	190	-F	3	V		50	1.0		ZX
623 MANI	31	0055E	0055U	0117	N14	E34	.632	16627	2.6	220	-F	3	V		70	.9	F	ZX
GRP81624	31	0107+0	0109+2	0124	S20	W08	.277	16622	30.4	17	-N						F	
PURP	31	0107	0109	0127	S21	W09	.299	16622	30.4	20	1N		C					
MANI	31	0107E	0111U	0121	S20	W07	.269	16622	30.5	140	-N	3	V		100	1.1	F	
625 MANI	31	0142E	0142U	0152	S11	E61	.870	16631	4.6	100	-N	3	V		70	1.3	F	ZX
GRP81626	31	0439	0449	0500	S12	E60	.861	16631	6.7	21	1F						F	
PURP	31	0439	0449	0500	S14	E60	.862	16631	4.7	21	1F		C					
MANI	31	0441E	0446U	0446D	S11	E60	.861	16631	4.7	50	-N	2	V		80	1.5	F	
GRP81627	31	0700E	0700	0733	S13	E57	.834	16631	6.6	33	1N						J	
YUNN	31	0700E	0700	0720	S14	E57	.835	16631	4.6	200	1N		C		225	4.1	J	
PURP	31	0709E	0709	0745	S13	E58	.844	16631	4.6	360	1N		P					
628 YUNN	31	0713E	0713	0723	N10	E46	.743	16627	3.8	40	-N		C		32	.5		ZX
629 ABST	31	0732	0733	0752	N14	E28	.562	16627	2.4	20	-F		C	0733	87	1.1	DJ	ZX
GRP81630	31	0757	0803+6	0834	S12	E56	.825	16631	6.5	37	-N						EJ	
YUNN	31	0757	0803	0820	S14	E56	.825	16631	4.5	23	-N		C		96	1.7	E	
ABST	31	0800E	0806	0848	S12	E56	.825	16631	4.5	480	1N		P	0806	174	3.3	EJ	
MANI	31	0803E	0809U	08130	S11	E59	.853	16631	4.8	100	-F	2	V		60	1.1	F	
GRP81631	31	0806+4	0810 0816+3	0830	N14	E37	.666	16627	5.1	24	-N				120	1.6	J	
PURP	31	0806	0819	0823	N14	E37	.666	16627	3.1	17	1N		C					
MANI	31	0806E	0810U	08130	N15	E41	.716	16627	3.4	70	-N	2	V		50	.8	F	
ABST	31	0808	0819	0845	N15	E36	.661	16627	3.0	37	-N		C	0819	131	1.8	EJ	
YUNN	31	0810	0816	0830	N13	E38	.672	16627	3.2	20	-N		C		113	1.5		
632 YUNN	31	0932	0934	0948	S15	E55	.816	16631	4.5	16	-N		C		96	1.7		ZX
633 YUNN	31	1036	1037	10380	S15	E53	.796	16631	4.4	20	1N		C		129	2.1		ZX
GRP81634	31	1150	1150+3	1211	N05	E03	.245	16625	3.2	21	-B				170	1.7		
RAMY	31	1150	1153	1213	N12	E11	.234	16625	1.3	20	-B	3	C		191			
ATHN	31	1152E	1153	1211	N08	E08	.277	16625	1.1	190	-B	3	V	1153	164	1.7		
635 RAMY	31	1150	1157	1202	S10	E54	.805	16631	4.5	12	-N	3	C		32			ZX

Hα SOLAR FLARES

JANUARY 1980

OBSERVATORY	OBSERVED UT				LOCATION					DURATION	IMPORTANCE	OBS.		MEASUREMENTS			REMARKS
	DATE	START	MAX. PHASE	END	APPROX LAT.	APPROX MER. DIST.	CENTRAL DISTANCE	HALE PLAGE REGION	CMP. DAY	MIN.		COND.	TYPE	TIME UT	MEAS. AREA Mill. of Disk	CORR AREA Sq. Deg.	
636 RAMY	31	1159	1159	1204	S13	E81	.985	16638	6.6	5	-F	3	C				ZX
637 RAMY	31	1334	1335	1339	S14	E60	.862	16631	5.1	5	-N	3	C		20		ZX
GRP81638	31	1340+3	1342 1434	1412	S14	E50	.764	16631	6.3	32	-N						
ATHN	31	1340E	1342	1400D	S15	E48	.743	16631	4.2	200	-B	3	V	1342	49	.8	
RAMY	31	1349	1404	1412	S13	E53	.795	16631	4.6	23	-N	3	C		41		
639 RAMY	31	1354	1359	1416	N07	E12	.303	16625	1.5	22	-F	3	C		55		ZX
640 RAMY	31	1408	1413	1431	S21	W14	.346	16622	30.5	23	-F	3	C		83		ZX
641 RAMY	31	1526	1531	1630	N17	E52	.832	16633	4.5	64	-N	3	C		61		ZX
GRP81642	31	1629+1	1633+2	1650	S19	W15	.335	16622	30.6	21	-B				150	1.6	
RAMY	31	1629	1630	1649	S20	W16	.358	16622	30.5	20	-B	3	C		159		FDE
BIGB	31	1630	1632	1650	S19	W15	.335	16622	30.6	20	1N		C	1632	140	1.5	

"REMARKS":

A = Eruptive prominence whose base is less than 90° from central meridian.
B = Probably the end of a more important flare.
C = Invisible 10 minutes before.
D = Brilliant point.
E = Two or more brilliant points.
F = Several eruptive centers.
G = No visible spots in the neighborhood.
H = Flare accompanied by high-speed dark filament.
I = Active region very extended.
J = Distinct variations of plage intensity before or after the flare.
K = Several intensity maxima.
L = Existing filaments show signs of sudden activity.
M = White-light flare.
N = Continuous spectrum shows effects of polarization.
O = Observations have been made in the H and K lines of CaII.
P = Flare shows helium D3 in emission.
Q = Flare shows Balmer continuum in emission.
R = Marked asymmetry in H-alpha line suggests ejection of high-velocity material.
S = Brightness follows disappearance of filament in same position.
T = Region active all day.
U = Two bright branches, parallel or converging.
V = Occurrence of an explosive phase: important, expansion within roughly 1 minute that often includes a significant intensity increase.
W = Great increase in area after time of maximum intensity.
X = Unusually wide H-alpha line.
Y = System of loop-type prominences.
Z = Major sunspot umbra covered by flare.

DAILY FLARE INDICES
Includes all Flares

JANUARY 1980

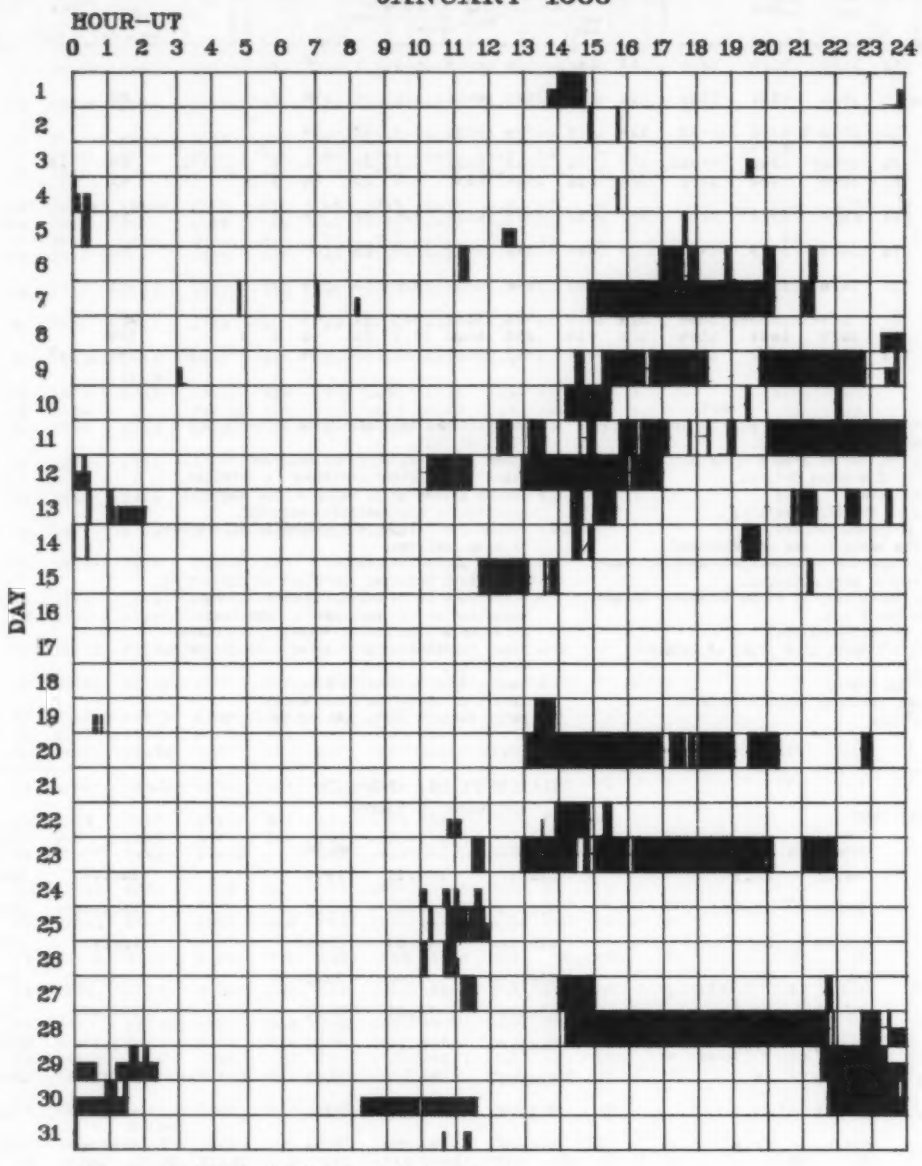
Date	Flare Index	HR. OBS.	Date	Flare Index	HR. OBS.	Date	Flare Index	HR. OBS.
800101.	46.23	23.2	800112.	200.31	18.8	800123.	285.20	16.0
800102.	75.63	23.9	800113.	189.43	21.7	800124.	124.24	24.0
800103.	33.69	24.0	800114.	90.80	23.1	800125.	195.40	22.9
800104.	565.20	23.9	800115.	81.42	22.2	800126.	33.93	23.6
800105.	477.43	23.7	800116.	74.31	24.0	800127.	56.08	22.4
800106.	294.50	22.2	800117.	26.18	24.0	800128.	118.30	15.9
800107.	192.30	18.3	800118.	28.23	24.0	800129.	229.24	21.8
800108.	287.59	24.0	800119.	77.12	23.4	800130.	43.45	21.4
800109.	319.66	17.8	800120.	79.79	17.4	800131.	96.16	24.0
800110.	369.71	22.5	800121.	107.40	24.0			
800111.	116.14	17.5	800122.	100.39	22.8			

When no Flare Index is given, it is 0 for that day.

INTERVALS OF NO FLARE PATROL OBSERVATION

FOR PRECEDING SOLAR FLARE TABLE

JANUARY 1980



Observatories included in total patrol:

Abastumani	Culgoora	Kanzelhoehe	Monte Mario	Tashkent
Athens	Haute Provence	Kharkov	Palehua	Tel Aviv
Big Bear	Holloman	Lvov	Pasadena	Voroshilov
Catania	Huancayo	Manila	Purple Mt.	Wendelstein
		Mitaka	Ramey	Yunnan

Times of no flare patrol are shown by the shaded area for each day divided into times of no cinematographic patrol (bottom half of day) and times of neither visual nor cinematographic patrol (top half of day).

SGD 445 Part II (Comprehensive)

MISCELLANEOUS DATA

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REGIONAL FLARE INDEX

Includes all Flares

DECEMBER 1979

MC MATH PLAGE NO.	LAT	CMP DATE	DATE FIRST FLARE	DATE LAST FLARE	FLARE-INDEX SUM	FLARE-INDEX MEAN	TOTAL NO. OF FLARES
16455	S16	79/12/01.4	79/11/25	79/12/03	18.48	1.16	4
16463	N12	79/12/01.5	79/12/01	79/12/08	13.74	1.72	1(
16471	N28	79/12/02.4	79/11/30	79/12/07	4.22	.53	2
16456	S15	79/12/02.5	79/11/29	79/12/01	23.43	7.81	6
16475	N31	79/12/03.2	79/12/01	79/12/01	10.13	10.13	3
16458	S17	79/12/03.4	79/11/29	79/12/10	206.82	17.23	50
16461	N26	79/12/03.8	79/12/01	79/12/04	6.76	1.69	E
16459	S24	79/12/04.3	79/11/29	79/12/08	10.77	1.08	5
16466	N21	79/12/05.3	79/11/30	79/12/01	2.53	1.27	3
16465	S25	79/12/05.4	79/11/29	79/12/11	154.51	11.89	41
16477	N21	79/12/06.2	79/12/03	79/12/03	1.98	1.98	1
16467	S16	79/12/06.7	79/11/30	79/12/11	218.34	10.20	42
16483	N13	79/12/07.3	79/12/10	79/12/14	25.32	5.06	11
16508	S15	79/12/08.3	79/12/13	79/12/14	5.17	2.59	4
16476	S25	79/12/08.1	79/11/30	79/12/12	34.80	2.62	22
16487	N 9	79/12/09.7	79/12/07	79/12/15	55.51	6.17	19
16478	S15	79/12/09.7	79/12/02	79/12/15	87.10	6.22	28
16490	N12	79/12/10.6	79/12/08	79/12/15	123.44	16.18	13
16486	N21	79/12/10.8	79/12/07	79/12/14	17.35	2.17	6
16493	S34	79/12/10.8	79/12/10	79/12/15	118.79	19.80	7
16492	S14	79/12/11.4	79/12/13	79/12/15	4.31	1.44	2
16489	N34	79/12/11.6	79/12/17	79/12/17	3.38	3.38	1
16499	N11	79/12/11.9	79/12/08	79/12/13	10.58	1.76	4
16495	S16	79/12/12.0	79/12/08	79/12/18	139.91	12.72	44
16509	S17	79/12/12.8	79/12/17	79/12/17	2.02	2.02	3
16503	S26	79/12/13.2	79/12/12	79/12/13	5.28	2.64	2
16506	N13	79/12/13.3	79/12/08	79/12/18	27.01	2.46	9
16502	N37	79/12/13.3	79/12/13	79/12/13	3.33	3.33	1
16496	N20	79/12/13.5	79/12/07	79/12/17	93.79	8.53	25
16507	N25	79/12/14.4	79/12/08	79/12/18	195.87	17.81	48
16498	S10	79/12/14.4	79/12/16	79/12/16	3.38	3.38	1
16513	S25	79/12/14.5	79/12/18	79/12/19	2.35	1.18	2
16505	N16	79/12/14.5	79/12/12	79/12/20	163.15	18.13	35
16511	N 9	79/12/14.7	79/12/16	79/12/17	13.40	6.70	5
16500	S33	79/12/15.2	79/12/08	79/12/15	9.78	1.22	3
16514	N10	79/12/15.8	79/12/13	79/12/20	37.25	12.16	23
16519	S16	79/12/16.3	79/12/13	79/12/13	3.45	3.45	2
16515	N20	79/12/17.4	79/12/13	79/12/18	5.49	.91	3
16516	S13	79/12/17.4	79/12/03	79/12/20	69.04	5.75	17
16518	S13	79/12/17.8	79/12/12	79/12/23	28.07	2.34	10
16522	S 7	79/12/18.7	79/12/17	79/12/24	477.42	53.68	37
16523	N26	79/12/19.1	79/12/19	79/12/19	3.90	3.90	1
16524	N16	79/12/19.7	79/12/18	79/12/23	10.20	1.70	3
16533	S23	79/12/19.8	79/12/20	79/12/24	55.66	11.13	15
16525	S16	79/12/20.4	79/12/17	79/12/24	8.09	1.01	7
16528	N21	79/12/21.0	79/12/21	79/12/21	5.23	5.23	1
16529	S15	79/12/22.2	79/12/15	79/12/29	1068.55	71.24	70
16535	N21	79/12/24.5	79/12/20	79/12/20	2.10	2.10	1
16539	S13	79/12/25.7	79/12/13	80/01/01	21.56	1.54	9
16541	S15	79/12/26.6	79/12/23	79/12/30	331.13	30.10	36
16545	N12	79/12/27.2	79/12/28	79/12/31	17.27	4.32	8
16547	S25	79/12/29.9	79/12/27	80/01/02	27.44	3.92	2
16548	S18	79/12/30.5	79/12/23	80/01/03	336.57	28.05	51

SOME OTHER SOURCES OF DATA

Data Available: Some data available in publication form are cited here. A list is given, along with addresses of the responsible institutions. The WDC-A for Solar-Terrestrial Physics publishes the Toyokawa, Ottawa and Penticton radio data in its monthly publication, *Solar-Geophysical Data*. The WDC-A for Solar-Terrestrial Physics also receives most of the periodicals when they become available.

Belgium: *Bulletin d'Observations: Activite Solaire - Observations Radioelectriques Solaires - 600 MHz (Humain, Belgium)* Observatoire Royal de Belgique, Ave. Circulaire 3, Brussels, Belgium (monthly since 1962)

Canada: *Solar Noise Observations at 2800 Mc/s (Ottawa - ARO) and 2700 Mc/s (Penticton - DRAO)* Series C Monthly Report, National Research Council, Radio Astronomy Section Ottawa 7, Ontario, Canada (since 1947)

France: *Carte Synoptiques de la Chromosphere Solaire* Observatoire de Paris, 92 Meudon, France (monthly since 1931)

Germany: *Daily Mean Value of Solar Flux Density* Heinrich-Hertz Institut, 1199 Berlin-Adlershof, Rudower Chaussee 5, G.D.R. (monthly since Jul 1957)

Italy: *Solar Phenomena - Monthly Bulletin and Photographic Supplement* Osservatorio Astronomica di Roma, Monte Mario, Rome, Italy (monthly since 1958); *Osservazion Solari, Solar Flux and Distinctive Events* Osservatorio Astronomico Di Trieste (quarterly since 1965); *Solar Observations made at Catania Astrophysical Observatory* (annually since 1967)

Japan: *Monthly Report of Solar Radio Emission* Radio Astronomy Section, Research Institute of Atmospherics, Nagoya University, Toyokawa, Japan (since 1956); *Solar Activity Chart* WDC-C2, Toyokawa Observatory, Nagoya University, Toyokawa, Japan (annually since 1968); *IAU Quarterly Bulletin on Solar Activity* Tokyo Astronomical Observatory, Mitaka, Tokyo, Japan (since 1978)

Netherlands: *Geomagnetic Data* IAGA Bulletin No. 12 (1932-69), No. 32 (since 1970) IUGG Publications Office, 39 ter, Rue Gay-Lussac, Paris V, France (annually)

Philippines: Manila Observatory "Solar Maps and Activity", Manila Observatory, P.O. Box 1231, Manila, Philippines (monthly)

Switzerland: Bulletin of "Berne Solar Observations", Institute of Applied Physics, Div. of Solar Observations, Sidlerstrasse 5, 3012 Berne, Switzerland (since 1968)

Taiwan: *Report on Sunspot Observations* Taiwan Provincial Weather Bureau Observatory, Taipei, Taiwan (quarterly since 1957)

USSR: СОЛНЕЧНЫЕ ДАННЫЕ *(Solar Data)* USSR Academy of Science (monthly since 1958); КОСМИЧЕСКИЕ ДАННЫЕ *(Cosmic Data)* (monthly since 1962); *Magnetic Fields of Sunspots* (bimonthly since 1964)

USA: *Preliminary Report and Forecast of Solar-Geophysical Activity* Space Environment Services Center, NOAA, Boulder, Colorado 80303 USA (weekly); *Solar-Geophysical Data* NOAA, Boulder, Colorado 80303 USA (monthly since November 1955)

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UAG-8 "Data on Solar-Geophysical Activity October 24 - November 6, 1968," Parts 1 and 2, March 1970, 312 pp, $1.75 (includes Parts 1 and 2).

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UAG-10 "Atlas of Ionograms," May 1970, 243 pp, $1.50.

UAG-12 "Solar-Geophysical Activity Associated with the Major Geomagnetic Storm of March 8, 1970," Parts 1, 2 and 3, April 1971, 466 pp, $3.00 (includes Parts 1-3).

UAG-13 "Data on the Solar Proton Event of November 2, 1969 through the Geomagnetic Storm of November 8-10, 1969," May 1971, 76 pp, $0.90.

UAG-14 "An Experimental, Comprehensive Flare Index and Its Derivation for 'Major" Flares, 1955-1969," July 1971, 25 pp, $0.30.

UAG-16 "Temporal Development of the Geophysical Distribution of Auroral Absorption for 30 Substorm Events in each of IQSY (1964-65) and IASY (1960)," September 1971, 131 pp, $0.70 (microfiche only).

UAG-17 "Ionospheric Drift Velocity Measurements at Jicamarca, Peru (July 1967 - March 1970)," October 1971, 45 pp, $0.55 (microfiche only).

UAG-18 "A Study of Polar Cap and Auroral Zone Magnetic Variations," June 1972, 21 pp, $0.20.

UAG-19 "Reevaluation of Solar Flares 1967," June 1972, 15 pp, $0.15.

UAG-21 "Preliminary Compilation of Data for Retrospective World Interval July 26 - August 14, 1972," November 1972, 128 pp, $0.70.

UAG-22 "Auroral Electrojet Magnetic Activity Indices (AE) for 1970," November 1972, 146 pp, $0.75.

UAG-23 "U.R.S.I. Handbook of Ionogram Interpretation and Reduction," Second Edition, November 1972, November 1972, 324 pp, $1.75.

UAG-23A "U.R.S.I. Handbook of Ionogram Interpretation and Reduction," Second Edition, Revision of Chapters 1-4, November 1972, 135 pp, $2.14.

UAG-24 "Data on Solar-Geophysical Activity Associated with the Major Ground Level Cosmic Ray Events of 24 January and 1 September 1971," Parts 1 and 2, December 1972, 462 pp, $2.00 (includes Parts 1 and 2).

UAG-25 "Observations of Jupiter's Sporadic Radio Emission in the Range 7.6-41 MHz, 9 September 1968 through 9 December 1971," February 1973, 35 pp, $0.35.

UAG-26 "Data Compilation for the Magnetospherically Quiet Periods February 19-23 and November 29 - December 3, 1970," May 1973, 129 pp, $0.70.

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